

A Theory of Property

Abraham Bell

Gideon Parchomovsky

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A THEORY OF PROPERTY

Abraham Bell† & Gideon Parchomovsky††

Notwithstanding its importance, property law has eluded both a consistent definition and a unified conceptual framework. Indeed, modern property scholarship has utterly splintered the field. On the one hand, instrumentalists view property as nothing more than default contract rules. On the other hand, conceptualists proclaim the primacy of in rem rights and specially privileged rights such as the rights to exclude, to use, and to transfer. Still other legal scholars think of property as a “bundle of sticks” capable of assuming any shape or form.

This Article proposes a unified theory of property predicated on the insight that property law is organized around creating and defending the value inherent in stable ownership. Focusing on the value of stable ownership renders coherent the splintered theories currently plaguing property scholarship and provides useful conceptual, descriptive, and normative implications. This Article begins by demonstrating that any coherent and comprehensive property theory must address four legal questions: (1) What things are protected by property law; (2) vis-à-vis whom; (3) with what rights; and (4) by what enforcement mechanism? Then, by focusing on the value inherent in stable ownership, we comprehensively address these four questions, showing how property law recognizes and helps create stable relationships between persons and assets, thereby allowing owners to extract utility otherwise unavailable.

In addition to theoretical coherence, this approach provides conceptual simplicity and clarity by rendering obsolete the “bundle of sticks” metaphor, replacing it instead with the view that property rights are a means to property’s end of defending the value of stable ownership. Furthermore, our value-oriented approach has both descriptive and normative power. For instance, descriptively, this Article shows that the modern trend to reduce the rights of finders of lost objects aims to protect the original owner’s value of stable ownership, as does the rejection of property claims by the good faith purchaser of void title. Normatively, this Article demonstrates the need for

† Visiting Associate Professor, Fordham University Law School; Lecturer, Bar Ilan University Faculty of Law.

†† Assistant Professor, University of Pennsylvania Law School. This Article greatly benefited from comments and criticisms by Oren Bar-Gill, Susan Block-Lieb, Abner Greene, Assaf Hamdani, Eugene Kontorovich, Brian Lenhard, Jide Nzelibe, Russell Pearce, Eduardo Penalver, Wendell Pritchett, Eric Rasmussen, Dan Richman, Chris Serkin, Peter Siegelman, Henry Smith, Linda Sugin, Steve Thel, Bill Treanor, Jay Weiser, Kaimi Wenger, Ben Zipursky, and participants in the Fordham University Law School Faculty Workshop. Peter Huh, Sean McEldowney, Drew Norman, and Kara Siegel provided outstanding research assistance. An earlier version of this Article was presented at the 2004 Annual Meeting of the American Law and Economics Association.

reform in a number of areas, including nuisance law, where current doctrines protect an owner's right to "use and enjoyment," but fail to protect the owner's right to value. Finally, the theory is extended to the outer boundaries of property by examining situations where the declining value of stable ownership suggests that property law should yield to the needs of other fields like contract law or secured transactions.

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INTRODUCTION

Property is important. Believed by some to be a keystone right,¹ or even the core of liberty,² property lies at the foundation of both contract and tort law. As a legal term, property is prominent in many doctrines and statutes. Importantly, in contrast to contractual rights that avail only against other parties to an agreement, property rights avail against the rest of the world, irrespective of consent. Hence, classifying an interest as property has far-reaching implications in our legal system. A simple example demonstrates the power and importance of property. Consider the conveyance of an automobile. A contract can sufficiently allocate legal rights between Buyer and Seller and, as between them, can render property law redundant. The Buyer and Seller, however, have no contractual relationship with third parties who may covet the automobile. Here, as between people out of contractual reach from one another, property is dominant. Because it is practically impossible for contracts to arrange most of society's relationships, property law determines most of the legal interactions regarding assets among people.

Yet, property law often seems to suffer from a characteristic disease of legal categories; everyone knows what it is, but no one can define it.³ Despite the recent renaissance of property as a subject of academic inquiry,⁴ the field seems to be in insoluble theoretic disar-

¹ See generally Carol M. Rose, *Property as the Keystone Right?*, 71 NOTRE DAME L. REV. 329 (1999) (reviewing and critically examining various sources that maintain property is a keystone right).

² See MILTON FRIEDMAN, *CAPITALISM AND FREEDOM* 7–21 (1962) (arguing that private property, in the form of economic freedom, is necessary for individual and political freedom); WALTER LIPPMANN, *THE METHOD OF FREEDOM* 101–02 (1934) (“[T]he only dependable foundation of personal liberty is the personal economic security of private property.”); Charles A. Reich, *The New Property*, 73 YALE L.J. 733, 771–74 (1964) (positing that “civil liberties must have a basis in property, or bills of rights will not preserve them”).

³ Cf. *Jacobellis v. Ohio*, 378 U.S. 184, 197 (1964) (Stewart, J., concurring) (empathizing with “the Court, which . . . was faced with the task of trying to define what may be indefinable” and, writing of “hard-core pornography” and the case at hand, “I shall not today attempt further to define the kinds of material I understand to be embraced within that shorthand description; and perhaps I could never succeed in intelligibly doing so. But I know it when I see it . . .”).

⁴ A number of recent articles have been distinguished by their excellence and the importance of their contributions to the revival of property. See, e.g., Hanoch Dagan, *The Craft of Property*, 91 CAL. L. REV. 1517 (2003) (claiming that the modern description of property as a bundle of sticks and the conception of property as forms can be incorporated into a realist approach to property); Michael A. Heller, *The Boundaries of Private Property*, 108 YALE L.J. 1163 (1999) [hereinafter Heller, *Boundaries*] (examining the boundary principle of private property); Michael A. Heller, *The Tragedy of the Anti-Commons: Property in Transition from Marx to Markets*, 111 HARV. L. REV. 621 (1998) [hereinafter Heller, *Anti-Commons*] (contributing a theory of anticommons property); Daphna Lewinsohn-Zamir, *The Objectivity of Well-Being and the Objectives of Property*, 78 N.Y.U. L. REV. 1669 (2003) (arguing for an objective theory of well-being for legal theory and developing an objective approach to property law); Thomas W. Merrill & Henry E. Smith, *Optimal Standardization in*

ray, with scholars scrambling to assemble a giant puzzle of ill-fitting pieces. New theories tend toward the extremes of either denying any meaning to property at all,⁵ or towards the magic of formalism,⁶ and both proclaim loudly—either proudly or shamefacedly—the complete disconnect with popular conceptions of what property is and why it should be protected.⁷

Nowhere is the disjointedness of property theory more manifest than in the gap between the two leading methodological approaches to property analysis—instrumentalism, represented in the main by law and economics,⁸ and formalism, or conceptualist scholarship.⁹ The two approaches seem so incompatible with one another that scholars

the Law of Property: The Numerus Clausus Principle, 110 YALE L.J. 1 (2000) [hereinafter Merrill & Smith, Numerus Clausus] (analyzing the numerus clausus principle); Thomas W. Merrill & Henry E. Smith, *The Property/Contract Interface*, 101 COLUM. L. REV. 773 (2001) [hereinafter Merrill & Smith, *Property/Contract Interface*] (exploring the distinction between in personam contract rights and in rem property rights and presenting a functional explanation for the legal system's use of these two modalities of rights); Henry E. Smith, *The Language of Property: Form, Context, and Audience*, 55 STAN. L. REV. 1105 (2003) (investigating the communicative aspect of property and considering the relationship between context and form, taking into account that the benefits and costs of communication vary with the nature of the audience). See generally Symposium, *The Evolution of Property Rights*, 31 J. LEG. STUD. S331 (2002) (assembling a series of articles regarding the evolution of property rights and property theory).

⁵ See, e.g., Thomas C. Grey, *The Disintegration of Property*, in PROPERTY: NOMOS XXII 69, 69 (J. Roland Pennock & John W. Chapman eds., 1980) ("By contrast, the theory of property rights held by the modern specialist tends both to dissolve the notion of ownership and to eliminate any necessary connection between property rights and thing."); Edward L. Rubin, *Due Process and the Administrative State*, 72 CAL. L. REV. 1044, 1086 (1984) (noting that "property is simply a label for whatever 'bundle of sticks' the individual has been granted."); cf. Adam Mossoff, *What is Property? Putting the Pieces Back Together*, 45 ARIZ. L. REV. 371, 374 (2003) (rejecting the exclusion theory of property and the bundle of sticks, and stating: "[a]s with any bundle of items—say a shopping bag of fruit, filled with oranges, apples, bananas and peaches—people are free to pack it and rearrange it in whatever way they see fit.").

⁶ For an approach seeking to revive the importance of the traditional formal elements of property, see Merrill & Smith, Numerus Clausus, *supra* note 4; Merrill & Smith, *Property/Contract Interface*, *supra* note 4. Note that Merrill and Smith, as discussed in the text, move far beyond formalism in advancing an informational theory of property.

⁷ See, e.g., BRUCE A. ACKERMAN, PRIVATE PROPERTY AND THE CONSTITUTION 113–15 (1977) (lamenting the absence of coherence in takings jurisprudence); JOHN G. SPRANKLING, UNDERSTANDING PROPERTY LAW 1–2 (2000) (noting that while most people think of property as "things," lawyers define property as "rights among people"); Grey, *supra* note 5, at 69–70 (comparing the popular understanding of property as thing-ownership to the bundle of rights conception); Thomas W. Merrill & Henry E. Smith, *What Happened to Property in Law and Economics?*, 111 YALE L.J. 357, 357 (2001) [hereinafter Merrill & Smith, *What Happened to Property*] (noting that "[a]lthough people are as concerned as ever with acquiring and defending their material possessions, in the academic world there is little interest in understanding property").

⁸ See *infra* Part I.C.

⁹ See *infra* Part I.D.

belonging to each of the vying camps accuse their counterparts of misunderstanding their topic of study.¹⁰

Law and economics scholars are pleased to eschew altogether any special meaning for property, viewing it as an aggregation of legal rights (or, in the common metaphor, a "bundle of sticks") no different than the legal rights aggregated under any other legal category.¹¹ At the basis of many economic treatments lies a Coasian approach.¹² This approach calls for well-defined legal rights to be first assigned and then allocated through voluntary exchanges mediated by the law of contracts.¹³ In Coase's view, property rights are simply background rules—legally created entitlements awaiting reallocation through contract.¹⁴ And, although Coase acknowledged that the initial rights allocation could affect the efficiency of an economic system,¹⁵ most subsequent economic theorists have declined to elaborate on this point, choosing instead to devote their attention to the contractual institutions allocating property rights.¹⁶ Consequently, law and economics scholars attach no importance to property as a distinct field of law; for purposes of the standard economic analysis, property might just as well be the part of contract law that specifies default rules.

The conceptualists counter with notions derived from Roman law, insisting on the primacy of *in rem* rights and specially privileged rights, including the rights to exclude, use, and transfer property.¹⁷ Some conceptualists advance instrumental reasons for certain ancient rules, but they fail, or do not bother, to explain the institution of property in its entirety.¹⁸ The instrumentalists, on the other hand, have explained some enforcement rules and property characteristics, but have little explanation—and, frankly, little use—for the aggrega-

¹⁰ See, e.g., Merrill & Smith, *What Happened to Property*, *supra* note 7, at 358 (accusing law and economics scholars of not taking property seriously).

¹¹ See *id.* (

To perhaps a greater extent than even the legal scholars, modern economists assume that property consists of an ad hoc collection of rights in resources. Indeed, there is a tendency among economists to use the term property 'to describe virtually every device—public or private, common-law or regulatory, contractual or governmental, formal or informal—by which divergences between private and social costs or benefits are reduced.'

(citations omitted)).

¹² See Ronald H. Coase, *The Problem of Social Cost*, 3 J. L. & ECON. 1 (1960).

¹³ *Id.* at 8–10.

¹⁴ *Id.* at 8.

¹⁵ *Id.* at 16 (noting that in a world with positive transaction costs "the initial delimitation of legal rights does have an effect on the efficiency with which the economic system operates").

¹⁶ For detailed discussion, see *infra* Part I.C.

¹⁷ See, e.g., A.M. Honoré, *Ownership*, in OXFORD ESSAYS IN JURISPRUDENCE 107 (A.G. Guest ed., 1961) (providing a list and explanation of leading property incidents). For a detailed discussion of his work, see *infra* Part I.B.

¹⁸ See *infra* Part I.B.

tion of ancient forms defining the law of property.¹⁹ Off to the side, scholars occasionally note that neither theoretical approach connects very well with the popular conceptions of what property is and why it is valuable,²⁰ but the critics have not been able to create a theory to compete with either the instrumentalists or the conceptualists.

Remarkably, what some might consider the central feature of property—its function as a device for capturing and retaining certain kinds of value—is almost completely absent from modern conceptual discussions of property.²¹ It was not always so. In earlier centuries, the issue of value almost completely dominated theories of property: how property created value, to whom it properly belonged, and how it helped capture and retain value for its rightful (or wrongful) owner. John Locke, for example, in his *Second Treatise of Government*, suggested that labor was the source of added value and that adding labor to natural resources, including the labor of finding the resource, created property naturally belonging to the laborer.²² Karl Marx agreed with and extended the labor theory of value, arguing that recognizing capitalists' property rights permitted alienation of value from its "true" owners—the workers.²³

As these earlier conceptions of value have faded away, so have their importance to property theory. In modern economics, value is created not by any intrinsic worth of inputs (such as labor); rather, value is created by relative tastes and scarcity of resources, while profit is created by arbitrage, relying on differences in taste, information, or nearly any other factor.²⁴ Thus, today it is believed that the institution of property is not necessary to guarantee the "real value" of an item

¹⁹ See *infra* Part I.C.

²⁰ See, e.g., Margaret Jane Radin, *Property and Personhood*, 34 STAN. L. REV. 957, 957 (1982) (proposing a personhood theory of property, wherein some control over resources in a person's external environment is necessary to proper self-development and noting how such a theory is often implicit in court opinions and commentaries, yet ignored in legal thought); see also Meir Dan-Cohen, *The Value of Ownership*, GLOBAL JURIST FRONTIERS, 2001, at 1, available at <http://www.bepress.com/gj/frontiers/vol1/iss2/art4> (last visited Feb. 4, 2005).

²¹ See *infra* Part I.

²² JOHN LOCKE, *THE SECOND TREATISE OF GOVERNMENT* ¶ 27, at 17 (Thomas P. Reidon ed., Liberal Arts Press 1952) (1690) (reasoning that

every man has a property in his own person; . . . The labor of his body and the work of his hands, we may say, are properly his. Whatsoever then he removes out of the state that Nature has provided and left it in, he has mixed his labor with, and joined to it something that is his own, and thereby makes it his property.

).

²³ KARL MARX, *CAPITAL* 1–99 (David McLellan ed., Oxford Univ. Press 1995) (1867).

²⁴ See ADAM SMITH, 1 *THE WEALTH OF NATIONS* 19–25 (1964) (examining value as a function of utility, scarcity, taste, and transferability).

for its "true" owner.²⁵ This logic, however, is flawed. The modern view that value derives from subjective tastes, rather than a platonic form of the "true" price, does not alter the fact that property is an institution uniquely qualified to protect certain kinds of value. Thus, even in a world where value is contingent rather than absolute, value remains the conceptual lynchpin of property theory.

To eliminate possible confusion, it is important to clarify at the outset that, as used in this Article, value is synonymous with utility or welfare as used in the field of welfare economics.²⁶ Hence, this Article's account belongs in the instrumentalist tradition. The Article departs from previous law and economics scholarship in that it seeks to evaluate the utility of property as a discrete legal field and unearth its defining characteristics. Instead of viewing property doctrines as contract's gap-filling rules, this Article views property as a legal field that stands on its own and serves its own goals. In other words, the Article argues that property as a field creates utility not provided by other fields like contract, just as previous scholars have argued that criminal law as a field creates utility not provided by other fields like tort.²⁷ The framework developed here explains why formal features of property beloved by property conceptualists are indispensable to a proper instrumentalist understanding of property.²⁸ Simultaneously, to the conceptualists, this Article shows that even in the muddled world of modern property theory, value is the central concept uniting the law of property.²⁹ Stated otherwise, this Article's mission is to explain the "individuation" of property, to borrow a phrase from Joseph Raz by

²⁵ See *id.* at 29 ("The labourer is rich or poor, is well or ill rewarded, in proportion to the real, not to the nominal price of his labour."). As Adam Smith further observed, "[w]hat everything is really worth to the man who has acquired it, and who wants to dispose of it or exchange it for something else, is the toil and trouble which it can save to himself, and which it can impose upon other people." *Id.* at 26. Thus, according to Smith, "real value" is the "the value of a certain quantity of labour which we exchange for what is supposed at the time to contain the value of an equal quantity." *Id.* "Nominal value," on the other hand, is the quantity of money paid for a good. *Id.* at 29.

²⁶ See Louis Kaplow & Steven Shavell, *Fairness Versus Welfare*, 114 HARV. L. REV. 961, 968 (2001) (defining welfare economics as "the method of policy assessment that depends solely on individuals' well-being" and noting that the welfare economics "conception of individuals' well-being is a comprehensive one. It recognizes not only individuals' levels of material comfort, but also their degree of aesthetic fulfillment, their feelings for others, and anything else that they might value, however intangible.").

²⁷ See, e.g., John C. Coffee, Jr., *Does "Unlawful" Mean "Criminal"? Reflections on the Disappearing Tort/Crime Distinction in American Law*, 71 B.U. L. REV. 193, 193-94 (1991) ("[T]he factor that most distinguishes the criminal law is its operation as a system of moral education and socialization. . . . Far more than tort law, [which focuses on compensating victims,] the criminal law is a system for public communication of values."); cf. TOM R. TYLER, *WHY PEOPLE OBEY THE LAW* 42-44 (1990) (providing survey results suggesting that people obey the criminal law because of its moral legitimacy, rather than its deterrent threat).

²⁸ See *infra* Part III.

²⁹ See *infra* Part III.C.

way of J.E. Penner.³⁰ That is, this Article explains why there is a branch of law called property and what purposes property law serves.

The account in this Article is predicated on the insight that property law as a legal institution is organized around creating and defending the value inherent in stable ownership. Property law both recognizes and helps create stable relationships between persons and assets,³¹ allowing owners to extract utility that is otherwise unavailable. Adopting this focus enables us to recast many of the key insights of the extant property literature and demonstrate that these insights can form a coherent theory of property.

As a first step, this Article analyzes the seemingly chaotic body of property literature and distills the foundational questions a comprehensive property theory must address. The Article posits that contemporary scholarship clusters around four questions: (1) which legal entitlements qualify for legal recognition as property rights?; (2) against whom do the rights apply?; (3) what is the content of property rights—i.e., what kinds of rights does the legal category of property bestow upon the owner?; and (4) what should be the remedies for property right infringement?

Curiously, property scholars have shied away from offering theories addressing these four questions as a whole, electing instead to engage in discrete analyses that center on one or several of these themes.³² At the risk of a mild overgeneralization, law and economics scholars have limited their investigations to the question of protection, while conceptualist theorists have focused their endeavors on the three other questions.³³ Yet, even the conceptualists have not sought to structure property theory around a single principle.³⁴ Radin, for example, has devoted her attention primarily to the first question,³⁵

³⁰ J.E. PENNER, *THE IDEA OF PROPERTY IN LAW* 32–67 (1997).

³¹ For detailed discussion, see *infra* Part II.B.

³² One notable exception is Laura Underkuffler, who ventured to develop a unified perspective to explain the concept of property. Underkuffler's perspective, however, differs significantly from this Article's perspective. In a very important book, Underkuffler analyzes the concept of property along four dimensions. The first dimension is "a theory of rights;" the second is "space, or area of field;" the third is "stringency" (of protection); and the fourth is "time." See LAURA S. UNDERKUFFLER, *THE IDEA OF PROPERTY: ITS MEANING AND POWER* 16–33 (2003).

³³ See *infra* Parts I.B., I.C.

³⁴ See *infra* Part I.B.

³⁵ See Margaret Jane Radin, Essay, *Compensation and Commensurability*, 43 DUKE L.J. 56, 72 (1993) (noting the challenge in determining tort compensation for pain and suffering, solace, and other nonmarket damages elements); Margaret Jane Radin, *The Liberal Conception of Property: Cross Currents in the Jurisprudence of Takings*, 88 COLUM. L. REV. 1667, 1667 (1988) (exploring the liberal conception of property and its presence in our constitution); Radin, *supra* note 20, at 986 (proposing a Hegelian notion of personal property as imbuing the owner with greater property rights than fungible property); Margaret Jane Radin, Address, *What, if Anything, Is Wrong with Baby Selling?*, 26 PAC. L.J. 135, 135 (1995) (exploring the legal ramifications of surrogacy, beginning with the issue of babies as property).

while Merrill and Smith have directed their interest to the second,³⁶ and Honoré has elected to explore the third.³⁷ Worse yet, the discrete analyses of each question have been conducted from varying and inconsistent perspectives.

This Article, by contrast, focuses not on a discrete question but on a common concept. This Article postulates that the value inherent in stable ownership plays an unheralded but key role in answering all four questions, rendering a confused field coherent. Furthermore, the Article demonstrates that the classic incidents of property are subordinate to the overriding goal of defending value and, therefore, must sometimes give way to a rule that protects value. Consequently, the theoretical framework proposed here extends to many of the satellite concepts that have been present in recent property scholarship, such as legal restrictions on the rights to exclude and alienate in order to prevent the overfragmentation of property.³⁸

Theoretical coherence is by no means the only virtue of this Article's analysis. An important result of the Article's theory is the abolition of the universally accepted but rarely understood characterization of property as a bundle of rights. In this Article, property is viewed as a mechanism for defending stable ownership value; thus, the various rights attending property are best viewed not as random sticks, but rather as means to property's end. This Article demonstrates that a focus on stable ownership value is necessary to solve Coase's open puzzle of arranging legal entitlements in order to maximize economic efficiency.³⁹ The realm of contracts is much smaller than assumed by standard analyses, and a law of property based on stable ownership value is thus essential to assuring the maximization of social welfare.

In addition to its conceptual implications, the value-oriented theory of property developed in this Article has both descriptive and normative power. Descriptively, this Article posits that the modern trend toward reducing the rights of non-owner possessors in fields such as the law of find⁴⁰ aims to protect the value of the original owner's sta-

³⁶ See generally Merrill & Smith, *Numerus Clausus*, *supra* note 4 (contending that courts should maintain limits upon the exercise of property rights for the sake of efficiency); Merrill & Smith, *Property/Contract Interface*, *supra* note 4 (attempting to delineate property law and contract law by contrasting the in rem and in personam rights protected by each respective branch); Merrill & Smith, *What Happened to Property*, *supra* note 7 (lamenting the decline of property as "a distinctive in rem right" and advocating the utility of such an approach).

³⁷ See, e.g., Honoré, *supra* note 17.

³⁸ Following Michael Heller's influential article, the problem of overfragmentation is often referred to in the literature as "anti-commons." See Heller, *Anti-Commons*, *supra* note 4, at 624.

³⁹ See *infra* Part I.C.

⁴⁰ See *infra* Part V.A.

ble ownership. The value theory similarly sheds new light on the primacy of the right to exclude in property law. Exclusion preserves owners' idiosyncratic values and bargaining position. Hence, it is fitting to allow (as current law does) harsh punishment for ostensibly trivial trespass.⁴¹ This Article explains the logic behind various partition rules and even some of the complexities of property rules concerning possession and chain of title.⁴²

Normatively, the value-oriented theory of property demonstrates the need for reform in a number of different areas. For instance, the value theory suggests that current nuisance law offers incomplete protection to property owners.⁴³ Current law protects only the owners' right to the "use and enjoyment" of their property, unfettered by unreasonable interference from their neighbors. A reformulated law of nuisance, by contrast, would also protect the owners' right to value. Another area of law ripe for rethinking under a value theory of property is the controversial subject of takings. The value theory provides an explanation for the Fifth Amendment's exclusive focus on property in takings protection; however, it challenges the current understanding of just compensation as being payment of market value since this measure misses the very element justifying extra property protection.⁴⁴

Finally, this Article extends its theory to the outer boundaries of property by examining situations in which other welfare considerations may limit the usefulness of property.⁴⁵ In such boundary situations, this Article argues that protection of stable ownership may bow partially, or completely, to the needs of other fields like contract or secured transactions. Here, again, the key is the importance of stable ownership value; as this value declines in magnitude, property law is removed from the picture, and legal disputes can and should be resolved by means of other legal tools. Among the fields analyzed in this framework are secured transactions and marital property.

The Article develops the stable ownership value theory of property as follows. Part I reviews the extant theoretical property literature. Part II identifies the core function of property as creating and defending the value inherent in stable property ownership. This leads to a reevaluation of property scholarship in Part III and an examination of where current scholarship succeeds and fails in explaining the design of the legal field of property. Part IV delineates the contours

⁴¹ See, e.g., *Jacque v. Steenberg Homes*, 563 N.W.2d 154, 165-66 (Wis. 1997) (upholding an award of \$100,000 in punitive damages against the defendant for delivering a mobile home over the plaintiff's property, notwithstanding the absence of "real" damages).

⁴² See *infra* Part V.A-B.

⁴³ See *infra* Part VI.A.

⁴⁴ See *infra* Part VI.B.

⁴⁵ See *infra* Part VII.

of property by crafting a four-step analysis. Using this new analysis, the Part demonstrates that the value theory provides a comprehensive framework for understanding property. Part V explores ways in which the Article's new concept of property illuminates current areas of law. Finally, Part VI highlights principles and doctrines in need of revision in light of the Article's new framework, while Part VII examines the boundary questions of property.

I

THE THEORY OF PROPERTY

This Article begins its foray into the thicket of property theory by describing some of the prominent past approaches to property. This Part aims to produce a rough grouping of various theories of property in order to advance the analysis of these theories' strengths and weaknesses, as well as enable a reordering of the theoretical approach in the next two Parts.

A. A Natural Right to Property

Aristotle conceived of the right to property as inherent in the moral order.⁴⁶ Criticizing Plato's preference for common property,⁴⁷ Aristotle argued for the primacy of private property because it would encourage people to attend to their own affairs rather than unduly interfering in the affairs of others.⁴⁸ Aristotle held this incentive to be the result of a self-love implanted by nature, such that only respect for private property could encourage the important virtue of liberality in the matter of property.⁴⁹ Interestingly, Aristotle viewed the right to exclude as a key component of property rights because it allowed owners to display virtue by waiving this right and sharing the benefits of property ownership with others.⁵⁰

In this tradition, early post-Enlightenment theories of property focused on a "natural" right to property. Perhaps the most famous of these theories is "the labor theory" associated with John Locke.⁵¹ Locke's point of departure was that God gave mankind in common the bountiful nature of the earth.⁵² Locke then posited that "every man has a property in his own person" and in "[t]he labor of his body

⁴⁶ ARISTOTLE, *THE POLITICS* ¶ 5, at 25–29 (Stephen Everson ed., 1988).

⁴⁷ PLATO, *REPUBLIC* 5 § 2, at 7–9 (S. Halliwell trans., 1993).

⁴⁸ ARISTOTLE, *supra* note 46, ¶ 5, at 26.

⁴⁹ *Id.* ¶ 5, at 26–27.

⁵⁰ *Id.* ¶ 5, at 26 ("And yet by reason of goodness, and in respect of us 'Friends', as the proverb says, 'will have all things common'. . . . For, although every man has his own property, some things he will place at the disposal of his friends, while of others he shares the use with them.").

⁵¹ LOCKE, *supra* note 22.

⁵² *Id.* ¶ 26, at 17.

and the work of his hands.”⁵³ Locke, therefore, deemed it just that one who expended labor upon objects could remove them from the common and claim them as private property.⁵⁴ Locke also added a utilitarian dimension by claiming that objects could not be beneficial to mankind until reduced to private property.⁵⁵

A different natural rights justification for property was developed by Freidrich Hegel.⁵⁶ Hegel’s “personhood theory” relies on the premise that property provides the mechanism by which humans achieve self-actualization.⁵⁷ Hegel posited that people’s core is found in their will.⁵⁸ The will, however, needs material objects to express itself, and private property is therefore indispensable to the external manifestation of the will.⁵⁹ Likewise, society’s recognition of private property further contributes to self-realization by respecting human agency. Thus, Hegel wrote that there can be no individual freedom without private property providing freedom’s external sphere.⁶⁰

In time, natural rights theories of property fell into eclipse, especially in the wake of the Realist movement.⁶¹ With only a few notable exceptions, such as Richard Epstein’s qualified endorsement of a Lockean concept of property⁶² and Margaret Jane Radin’s embrace of a version of Hegel’s ideas about the importance of property to personhood,⁶³ most scholars today base their understandings of property on a model where property is justified by utilitarianism and defined by positive law rather than upon natural rights theories.

⁵³ *Id.* ¶ 27, at 17.

⁵⁴ *See id.*

⁵⁵ *Id.* ¶ 26, at 17.

⁵⁶ Some have noted that while Hegel argued for the importance of property on moral grounds, Hegel does not advance a natural rights-based, or even a rights-based, theory. *See* SHLOMO AVINERI, *HEGEL’S THEORY OF THE MODERN STATE* 132 (1972) (noting that Hegel’s concept of human freedom “is not to be found in any legendary state of nature, but evolves precisely out of his effort to dissociate himself from his state of primeval savagery”); Jeanne Lorraine Schroeder, *Virgin Territory: Margaret Radin’s Imagery of Personal Property as the Inviolable Feminine Body*, 79 MINN. L. REV. 55, 124 n.263 (“Hegel’s property theory is intensely anti-naturalistic.”).

⁵⁷ G.W.F. HEGEL, *PHILOSOPHY OF RIGHT* ¶45, at 52 (S.W. Dyde trans., 1996) (1896).

⁵⁸ *Id.* ¶¶ 39–45, at 46–52.

⁵⁹ *Id.*

⁶⁰ *Id.*

⁶¹ *See, e.g.*, Mossoff, *supra* note 5, at 372 (2003) (“Since the turn of the century, the concept of property had succumbed to the acid wash of a nominalism first popularized in the law by the legal realists.”).

⁶² *See, e.g.*, RICHARD A. EPSTEIN, *TAKINGS: PRIVATE PROPERTY AND THE POWER OF EMINENT DOMAIN* 11–12 (1985) (“[I]f we correct [Locke’s] account of the original position to remove all traces of original ownership in common, then the soundness of his position is true, *a fortiori*.”). *But see* notes 323–25 and accompanying text.

⁶³ *See* Radin, *supra* note 20.

B. Positivism and Conceptualism

Jeremy Bentham, who scathingly dismissed natural rights, launched perhaps the most famous attack on natural rights theories:

Right . . . is the child of law; from real laws come real rights; from imaginary laws, from laws of nature, fancied and invented by poets, rhetoricians, and dealers in moral and intellectual poisons, come imaginary rights, a bastard brood of monsters. . . . Natural rights is simple nonsense: natural and imprescriptible rights, rhetorical nonsense—nonsense upon stilts.⁶⁴

Naturally, Bentham was equally as dismissive of property rights as natural rights. In his view, “[p]roperty and law are born together, and die together. Before laws were made there was no property; take away laws, and property ceases.”⁶⁵ Bentham suggested, instead, a utilitarian basis for the law,⁶⁶ an idea that eventually bore fruit in such frankly utilitarian legal analyses as the burgeoning economic analysis of law.

During the nineteenth century, however, while natural rights theories continued to reign supreme, William Blackstone provided the dominant understanding of property rights. Blackstone, nominally a believer in natural rights, but a formalist and conceptualist in practice, was less interested in the justifications for property law, and more in the minutiae of its substance.⁶⁷ In his *Commentaries on the Laws of England*, Blackstone coined a formulation that eventually became the rallying cry of an expansive understanding of property. Property, wrote Blackstone, is “that sole and despotic dominion which one man claims and exercises over the external things of the world, in total exclusion of the right of any other individual in the universe.”⁶⁸ This famous formulation includes several central elements. First, property is concerned with rights in rem, i.e., “those rights which a man may acquire in and to such external things as are unconnected with his person.”⁶⁹ Second, in the ideal, property belongs to a single individual, or as Blackstone put it, “one man.”⁷⁰ Third, where land is concerned, property rights extend indefinitely upwards into the heavens and downwards to the center of the earth.⁷¹ Fourth, the principal right attached to property is the right to exclude “any other individual

⁶⁴ 2 JEREMY BENTHAM, *Anarchical Fallacies*, in THE WORKS OF JEREMY BENTHAM 489, 523, 501 (J. Bowring ed., 1983).

⁶⁵ JEREMY BENTHAM, THE THEORY OF LEGISLATION 113 (C.K. Ogden ed., 1931) (1882).

⁶⁶ *Id.*

⁶⁷ See Albert W. Alschuler, *Rediscovering Blackstone*, 145 U. PA. L. REV. 1, 4 (1996).

⁶⁸ WILLIAM BLACKSTONE, II COMMENTARIES ON THE LAWS OF ENGLAND, Chap. 1, 3 (Wayne Morrison ed., 2001) (1765–1769).

⁶⁹ *Id.*

⁷⁰ *Id.*

⁷¹ *Id.* at Chap. 2, 13–15.

in the universe."⁷² While Blackstone probably did not intend this result,⁷³ modern theorists associated this formulation with an absolutist view of property that eventually came to be known, somewhat inaccurately, as the "Blackstonian bundle of land entitlements."⁷⁴ The Blackstonian bundle presupposes impeccably demarcated parcels whose boundaries extend upward to the heavens and downward to the depths of the earth, and bestows upon owners unbridled powers and privileges to use, transfer, and even abuse land.⁷⁵

By the beginning of the twentieth century, however, the Blackstonian conception began to wear. In a highly influential series of articles, Wesley Hohfeld sought to render legal thought more coherent by clarifying the basic concepts of the law.⁷⁶ Concerned about the looseness with which legal terminology had been used, Hohfeld refined existing concepts and created new ones to develop a comprehensive legal taxonomy.⁷⁷ Of particular importance here is his treatment of property rights. While Hohfeld listed ownership as his paradigmatic example of an in rem right, he reconceived of in rem rights as mere expressions of in personam rights vis-à-vis an indefinitely large class of people.⁷⁸ Hohfeld also pointed out that property, as a legal concept, comprises not only rights,⁷⁹ but also privileges⁸⁰ and powers.⁸¹ He further elucidated that the crux of property is not a relationship between a person and an object, as Blackstone had suggested, but rather a nexus of legal relationships among people regard-

⁷² *Id.* at Chap. 1, 3.

⁷³ *See, e.g.,* Alschuler, *supra* note 67, at 30-31 & n.176 (criticizing modern property theorists for mistating Blackstone's view of property rights).

⁷⁴ *See, e.g.,* Robert C. Ellickson, *Property in Land*, 102 YALE L.J. 1315, 1362-63 (1993) (listing the Blackstonian package of private entitlements).

⁷⁵ *Id.*

⁷⁶ Wesley Newcomb Hohfeld, *Fundamental Legal Conceptions as Applied in Judicial Reasoning*, 26 YALE L.J. 710 (1917) [hereinafter Hohfeld II]; Wesley Newcomb Hohfeld, *Some Fundamental Legal Conceptions as Applied in Judicial Reasoning*, 23 YALE L.J. 16 (1913) [hereinafter Hohfeld I].

⁷⁷ *Id.*

⁷⁸ Hohfeld II, *supra* note 76, at 718-33.

⁷⁹ Hohfeld gives meaning to "right" by comparison to its correlative "duty" through an example: "if X has a right against Y that he shall stay off the former's land, the correlative (and equivalent) is that Y is under a duty toward X to stay off the place." Hohfeld I, *supra* note 76, at 32. Compare definitions of "privilege," *infra* note 80, with definition of "power," *infra* note 81.

⁸⁰ For Hohfeld, the antithesis of the right-duty relationship is the privilege-no-right relationship. Hohfeld I, *supra* note 76, at 32. Thus, "privilege" gets meaning by comparison to the correlative, "no-right" by his example: "whereas X has a *right* or *claim* that Y, the other man, should stay off the land, he himself has the *privilege* of entering on the land; or, in equivalent words, X does not have a duty to stay off." *Id.*

⁸¹ "Power," in the Hohfeldian taxonomy, has the correlative "liability." *Id.* at 44. Thus, a "power-holder" is one who has the capacity to alter the legal status of the "liability-bearer." *See id.*; *see also* RESTATEMENT (FIRST) OF PROPERTY § 3 illus. 1-3 (1936).

ing an object.⁸² Hohfeld did not intend to create a comprehensive view. While his analysis of whether property should properly be viewed as an in rem right has since become a staple of property theory, Hohfeld saw no need to address the practical implications of his taxonomy.⁸³ Working from a purely conceptual perspective, Hohfeld did not concern himself with policy issues at all.⁸⁴

Nevertheless, Hohfeld's observations generally are credited with having created an entirely new understanding of property as a "bundle of rights."⁸⁵ The "bundle of rights" concept of property denies any fixed meaning to the term property and deemphasizes the importance of the thing with regard to which the rights are claimed.⁸⁶ In the bundle metaphor, each right, power, privilege, or duty is but one stick in an aggregate bundle that constitutes a property relationship.⁸⁷ Whether removing a stick (or set thereof) from the bundle will negate the classification of the remainder as property cannot be determined in advance.⁸⁸ Thus, the bundle of rights theory transformed property

⁸² This conclusion arises from the observation that rights are by definition relationship between people. See *supra* note 79. Where there is a right there must necessarily be a correlative duty, and an object cannot owe a duty. *Id.*

⁸³ See Hohfeld II, *supra* note 76; Hohfeld I, *supra* note 76.

⁸⁴ See *id.*

⁸⁵ See, e.g., Katy Barnett, Case Note, *Western Australia v. Ward: One Step Forward and Two Steps Back: Native Title and the Bundle of Rights Analysis*, 24 MELB. U. L. REV. 462, 469 (2000) ("The bundle of rights theory is the dominant paradigm applied by Western legal philosophers, combining the theories of Hohfeld and Honoré."); Merrill & Smith, *Property/Contract Interface*, *supra* note 4, at 783 ("Although Hohfeld did not adopt the metaphor of a 'bundle of rights,' [his work] . . . directly anticipates [the] adoption . . . [favored] by the Legal Realists."); J.E. Penner, *The "Bundle of Rights" Picture of Property*, 43 U.C.L.A. L. REV. 711, 724-25 (1996) (stating that Hohfeld "provide[d] the frame in which the bundle of rights picture is constructed"); Courtney C. Tedrowe, Note, *Conceptual Severance and Takings in the Federal Circuit*, 85 CORNELL L. REV. 586, 589 (2000) ("Wesley Hohfeld first attempted to construct a theory of property out of the bundle-of-rights metaphor."). But see Myrl L. Duncan, *Reconceiving the Bundle of Sticks: Land as a Community-Based Resource*, 32 ENVTL. L. 773, 774 n.1 (2002) (citing William M. Wiecek for the proposition that "the phrase 'bundle of rights' first appeared in JOHN LEWIS, A TREATISE ON THE LAW OF EMINENT DOMAIN IN THE UNITED STATES 41, 43 (1888)"); Jeanne L. Schroeder, *Chix Nix Bundle-o-Stix: A Feminist Critique of the Disaggregation of Property*, 93 MICH. L. REV. 239, 239-40 n.2 (1994) (deriding the "familiar 'bundle of rights' notion," as "a vulgarization of Hohfeld's analytic scheme . . .").

⁸⁶ See *supra* note 11.

⁸⁷ *Id.*

⁸⁸ *Moore v. Regents of the Univ. of Cal.*, 793 P.2d 479, 510 (Cal. 1990) (Mosk, J., dissenting) (

[Though a] . . . limitation or prohibition diminishes the bundle of rights that would otherwise attach to the property, [] what remains is still deemed in law to be a protectible property interest. . . . [This is because], ' . . . property or title is a complex bundle of rights, duties, powers and immunities, [and] the pruning away of some or a great many of these elements does not entirely destroy the title

(quoting *People v. Walker*, 90 P.2d 854 (1939))).

into an almost infinitely malleable concept, amenable to numerous permutations, and subject to *ad hoc* decisionmaking.

A.M. Honoré played a decisive role in advancing the bundle of rights metaphor by cataloguing a generally accepted list of the "incidents" of property or ownership.⁸⁹ Acknowledging that the "fashion [of] speak[ing] of ownership as if were just a bundle of rights" might require small modification of the list, Honoré nevertheless confidently asserted:

Ownership comprises the right to possess, the right to use, the right to manage, the right to the income of the thing, the right to the capital, the right to security, the rights or incidents of transmissibility and absence of term, the prohibition of harmful use, liability to execution, and the incident of residuary: this makes eleven leading incidents.⁹⁰

Importantly, Honoré noted that the importance of the list lay in it being an alternative to the "distortion" of the past, in which it was viewed as property in the concentration of absolute rights of use, exclusion and transfer⁹¹ in a single individual.⁹² Honoré emphasized instead the lack of primacy of any individual stick in the bundle.⁹³

Today, the bundle of rights conception of property rules the academic field. As Bruce Ackerman noted acerbically, the concept has become a "consensus view so pervasive that even the dimmest law student can be counted upon to parrot the ritual phrases on command."⁹⁴ The result has been what some lament as the end of property law. In Thomas Grey's words,

We have gone . . . in less than two centuries, from a world in which property was a central idea mirroring a clearly understood institution to one in which it is no longer a coherent or crucial category in our conceptual scheme. The concept of property and the institution of property have disintegrated. . . .

The substitution of a bundle-of-rights for a thing-ownership conception of property has the ultimate consequence that property ceases to be an important category in legal and political theory.⁹⁵

C. Utilitarianism

As the legal conceptualization of property changed, so too did the justifications for property. The seeds planted by Bentham⁹⁶ struck

⁸⁹ See Honoré, *supra* note 17, at 112-28.

⁹⁰ *Id.* at 113.

⁹¹ Honoré added "immunity from expropriation" to the list. *Id.*

⁹² *Id.*

⁹³ *Id.*

⁹⁴ ACKERMAN, *supra* note 7, at 26.

⁹⁵ Grey, *supra* note 5, at 74, 81.

⁹⁶ See *supra* Part I.B.

root, and today, many influential scholars justify property on instrumental and positive grounds. Today, there is widespread agreement that the law orders property in response to societal needs, rather than in obeisance to a moral command or the natural order of the universe.⁹⁷

Property, like many other legal fields, has been heavily influenced by the movement to apply economic analysis to legal questions. Credit for generating this field has been ascribed at different times to Oliver Wendell Holmes,⁹⁸ Ronald Coase,⁹⁹ and Richard Posner;¹⁰⁰ today, however, it is Coase's ideas that have had the most lasting impact in the field. Like much of modern law and economics, the two organizing principles of property law analysis are externalities and transaction costs. Negative externalities are costs created by one actor borne by another.¹⁰¹ Classical economics views externalities as a market failure that prevents otherwise competitive markets from achieving allocative efficiency.¹⁰² Ronald Coase revolutionized the field by noting that externalities will only lead to inefficiency where transaction costs impair private bargaining.¹⁰³ In the absence of transaction costs, he wrote, parties would always negotiate for an efficient result notwithstanding externalities.¹⁰⁴ While Coase paid no heed to the content of property, his analysis set the groundwork for subsequent contributions.

⁹⁷ To be sure, there remain some natural theory defenses of property, especially those sounding in Locke's theory. See, e.g., Wendy J. Gordon, *A Property Right in Self-Expression: Equality and Individualism in the Natural Law of Intellectual Property*, 102 YALE L.J. 1533 (1993) (proposing a natural rights-based theory of intellectual property). Indeed, Locke's theory of natural rights in property continues to influence courts, especially in the area of intellectual property. See, e.g., *Ruckelshaus v. Monsanto Co.*, 467 U.S. 986, 1002-03 (1984) (citing Locke's *Second Treatise* as support for their holding that trade secret rights can be considered "property" under the Takings Clause of the Fifth Amendment).

⁹⁸ See, e.g., MARY ANN GLENDON, *A NATION UNDER LAWYERS: HOW THE CRISIS IN THE LEGAL PROFESSION IS TRANSFORMING AMERICAN SOCIETY* 187 (1994) ("[Holmes'] writings, studded with quotable aphorisms, set the intellectual agenda of the law for the entire twentieth century. Legal realism, pragmatism, sociological jurisprudence, law and economics, and critical legal studies are all elaborations of themes announced by Holmes."); see also RICHARD POSNER, *OVERCOMING LAW* 13-15 (1995).

⁹⁹ See, e.g., George L. Priest, *Gossiping About Ideas*, 93 YALE L.J. 1625, 1629 (1984) (book review) ("The conceptual revolution that provided the vision . . . was the Chicago School law and economics of Ronald Coase.").

¹⁰⁰ See, e.g., Gary Minda, *The Jurisprudential Movements of the 1980s*, 50 OHIO ST. L.J. 599, 605 (1989) (writing that "these 'hardliners' of the Chicago School (the founding fathers) . . . advocated strong claims based on the law-and-efficiency hypothesis. This hypothesis [is] normally associated with the views of Judge Richard A. Posner . . .").

¹⁰¹ See R.H. COASE, *THE FIRM, THE MARKET, AND THE LAW* 23-24 (1988).

¹⁰² PAUL A. SAMUELSON & WILLIAM D. NORDHAUS, *ECONOMICS* 756 (15th ed. 1995) (defining market failure as "[a]n imperfection in a price system that prevents an efficient allocation of resources. Important examples are externalities and imperfect competition").

¹⁰³ R.H. COASE, *supra* note 101, at 12-13.

¹⁰⁴ *Id.* at 13-15.

Harold Demsetz built on Coase's foundation in advancing his important evolutionary theory of private property.¹⁰⁵ Demsetz's point of departure was identical to Locke's—a hypothesized early state of nature in which property was held in common.¹⁰⁶ Demsetz's explanation of the transition from commons property to private property, however, was very different. Demsetz noted that in comparison with commons, private ownership permitted a single owner to internalize most costs and benefits, and greatly reduced the number of people exposed to externalities.¹⁰⁷ Thus, Demsetz expected private property to arise whenever the gains produced by internalization exceeded the transaction costs involved in establishing the property right and the legal system designed to protect that right.¹⁰⁸ Interestingly, Demsetz's justification for property was not accompanied by any extended analysis of the concept or content of property. Thus, Demsetz unwittingly contributed to the further disintegration of the notion of property by signaling the divorce of normative and descriptive property theory.¹⁰⁹

A new level of ambiguity was added to scholarly understandings of property in the law and economic literature by Guido Calabresi and Douglas Melamed. Calabresi and Melamed elected to attach "property" to a type of legal enforcement which they termed "entitlements."¹¹⁰ By doing so, Calabresi and Melamed effectively added a third layer to the already-bifurcated property analysis. Working from the Coasean perspective, Calabresi and Melamed devised a tripartite menu of protecting legal entitlements, consisting of inalienability rule protection, property rule protection, and liability rule protection.¹¹¹ Entitlements protected by an inalienability rule may not be transferred even with the consent of the owner.¹¹² Those entitlements protected by a property rule may be transferred by the owner at a price to which the owner agrees.¹¹³ As for entitlements protected by a liability rule, they may be taken by third parties in exchange for the payment of a price determined by the third party; the owner has no veto power, and must suffice herself with the compensation she receives.¹¹⁴

The taxonomy devised by Calabresi and Melamed, although ingenious, confused the concept of property. For while the term "prop-

¹⁰⁵ *Id.* at 354.

¹⁰⁶ *Id.*

¹⁰⁷ Harold Demsetz, *Toward a Theory of Property Rights*, 57 AM. ECON. REV. 347, 355-56 (1967).

¹⁰⁸ *Id.* at 350.

¹⁰⁹ *Id.* at 354-59.

¹¹⁰ *Id.*

¹¹¹ Guido Calabresi & A. Douglas Melamed, *Property Rules, Liability Rules, and Inalienability: One View of the Cathedral*, 85 HARV. L. REV. 1089, 1092 (1972).

¹¹² *Id.* at 1092-93.

¹¹³ *Id.* at 1092.

¹¹⁴ *Id.*

erty rule protection" implies a tight relation to property, this allusion is misleading. Alongside the normative justifications for property and the descriptive analyses of property's incidents, Calabresi and Melamed described property as a mode of protection that enabled entitlement holders to enjoin nonconsensual uses of their entitlement—a power they dubbed "property rule protection."¹¹⁵ Moreover, Calabresi and Melamed aggravated the confusion at the descriptive level by suggesting that any legal entitlement could be subject to property rule protection, thereby conflating the entire Hohfeldian vernacular¹¹⁶ into a single, catch-all term that fails to discriminate between property rights and other legal rights.

Yoram Barzel introduced yet another division of property. Barzel distinguished between "economic property," defined as "*the individual's ability, in expected terms, to consume the good (or the services of the asset) directly or to consume it indirectly through exchange,*" and "legal property," defined as those economic property rights that are "*recognized and enforced, in part, by the government.*"¹¹⁷ Economic property, for Barzel, is an exceptionally broad term, encompassing the rights of anyone with any ability to consume the good in any fashion.¹¹⁸ For instance, in Barzel's view, a car thief is a co-owner of a car along with the title holder, because each has the ability to consume, in certain circumstances, a portion of the attributes of the asset.¹¹⁹

Barzel also relied upon Coase's insights to argue that the crux of property is the allocation of rights in environments of positive transaction costs.¹²⁰ Barzel's model stipulated that private contracting would invariably fail to capture certain valuable attributes of assets.¹²¹ The legal institution of property, on Barzel's view, simply organized some forms of protection for those attributes of an asset not addressed by optimal contracting.¹²² For Barzel, therefore, property is a residual institution subordinate to the institution of contracts; legal property is an even less significant factor, because it is concerned with some instances in which the state might protect economic property rights.¹²³ As Barzel put it, "[a]t the heart of the study of property lies the study of contracts."¹²⁴ Yet, as Smith and Merrill astutely observed, Barzel's analysis suffers from a potential baseline problem. Barzel's analysis is

115 *Id.*

116 *See supra* Part I.B.

117 YORAM BARZEL, *ECONOMIC ANALYSIS OF PROPERTY RIGHTS* 3–4 (2d ed. 1997).

118 *See id.*

119 *See id.*

120 *See id.* at 7–9, 11–13.

121 *Id.* at 39–40.

122 *Id.* at 141.

123 *Id.*

124 *Id.* at 33.

predicated on the primacy of contracts over property, but as Merrill and Smith point out "one cannot enter into contracts over the use of resources without some baseline to determine who contracts with whom."¹²⁵

In the final tally, the positivist and utilitarian analyses have splintered the institution of property in several ways. Positivists have driven a wedge between descriptive and normative dimensions of property. Utilitarians have contributed to the incoherence by breaking the concept of property into legal rights and economic rights (Barzel), and divorcing the issue of primary rights from the issue of enforcement (Calabresi and Melamed).

D. Relational Conceptions of Property

In juxtaposition to the utilitarian and conceptualist property theories, a different analysis recently arose emphasizing the interpersonal relationships surrounding property rights. The most notable work in this genre is Margaret Jane Radin's *Property and Personhood*.¹²⁶ Building on Hegel's theory, Radin introduced an important distinction between personal and fungible property.¹²⁷ An object belongs in the former category "if its loss causes pain that cannot be relieved by the object's replacement."¹²⁸ In contrast, it comes within the latter if "perfectly replaceable with other goods of equal market value."¹²⁹ Personal property constitutes one's self; fungible property is held for "purely instrumental reasons."¹³⁰ Radin, then, suggested that objects could be ordered on a continuum running from personal to fungible.¹³¹ Moving to the normative implications, Radin proposed a "two-level" property system that offers differential protection to entitlements in accordance with their classification as personal or fungible.¹³² Furthermore, Radin suggested that her theory might imply an obligation on the part of the government to "guarantee citizens all entitlements necessary for personhood" and to ensure "that fungible

¹²⁵ Merrill & Smith, *What Happened to Property*, *supra* note 7, at 377.

¹²⁶ *Supra* note 20.

¹²⁷ *Id.* at 959-60. It is worth noting that Radin's project was motivated in part as a response to the dominance of utilitarian theories of property and their celebration of the market mechanism as a means for allocating resources. *Id.* at 958. Radin, by contrast, argued that the market has inherent limitations and that certain entitlements should be excluded from market exchange. This theme was more fully developed in Margaret Jane Radin, *Market-Inalienability*, 100 HARV. L. REV. 1849 (1987).

¹²⁸ Radin, *supra* note 20, at 959.

¹²⁹ *Id.* at 960.

¹³⁰ *Id.*

¹³¹ *Id.* at 986.

¹³² *See id.* at 986-87.

property of some people does not overwhelm the opportunities of the rest to constitute themselves in [personal] property.”¹³³

Notwithstanding its ingenuity and importance, Radin’s analysis further obscured the concept of property. Radin implied that theorists could no longer simply refer to property as a generic relationship among people with regard to objects. Rather, Radin’s analysis requires careful scrutiny of the nature of objects subject to property rights and the roles objects play in constituting the personalities of the persons claiming them.

E. Neo-Conceptualism and Utilitarianism

Most recently, a new body of scholarship has sought to recover the conceptual coherence of property by joining traditional doctrines with some basic utilitarian justifications. In an important series of articles, Thomas Merrill and Henry Smith sought to reintroduce some coherence to property law by stressing the centrality of two basic features of property law: the in rem nature of property rights¹³⁴ and the *numerus clausus* principle, under which property rights “must track a limited number of standard forms.”¹³⁵ Merrill and Smith observed that “[w]hen property rights are created, third parties must expend time and resources to determine the attributes of these rights, both to avoid violating them and to acquire them from present holders.”¹³⁶ Consequently, the creation of idiosyncratic property rights increases the information costs property imposes on third parties.¹³⁷ Standardization, on the other hand, reduces them.¹³⁸

II

A UNIFIED VALUE APPROACH TO PROPERTY

This Part has two aims. First, it isolates the core function around which property theory is constructed. Second, it explains how property is designed to serve this core function. Here, it both sketches the outlines of how basic property rules serve property goals and outlines the limits of property law’s usefulness. The central aim of this Part is to present this Article’s theory—that the institution of property is designed to create and defend the value that inheres in stable ownership. Property accomplishes this feat by creating and protecting the relationship between a person and assets.

¹³³ *Id.* at 990.

¹³⁴ Merrill & Smith, *Property/Contract Interface*, *supra* note 4, at 780–89.

¹³⁵ Merrill & Smith, *Numerus Clausus*, *supra* note 4, at 4.

¹³⁶ *Id.* at 8.

¹³⁷ *Id.*

¹³⁸ *Id.*

It bears noting at the outset that this Article does not aspire to create a radically different understanding of property; rather, it demonstrates that a coherent understanding of property can result from rearranging elements of many of the theories discussed through the years. Thus, the scope of this Article is to present an understanding of property that is designed to justify what J.E. Penner labeled (using terminology introduced by Joseph Raz) the individuation of property.¹³⁹ In other words, this Article shows what utility the creation of a distinct branch of law called property serves.

A. Overview: Property and Stability

This Section presents a more extensive analysis of the stability value created by property. The conclusion is that a property system with stable rights increases the value of assets to users (now owners) and decreases the costs of obtaining and defending those assets. Furthermore, this Article posits that a universally accepted and centrally policed property system provides the most cost-effective means of producing these benefits due to economies of scale. Finally, the Article shows that, generally, the benefits provided by property systems increase with the stability of the property rights they create.

The institution of property is not the only utility-enhancing institution in the law, nor is the value of stable ownership the only value that is—or should be—enhanced by legal institutions. This Article's point of departure, however, is that the law is divided into numerous legal fields such as property, torts, contracts, and tax in order to handle characteristically similar utility questions in common fashion. In describing property, this Section discusses how property deals with value-enhancing relationships regarding assets and, in particular, how property increases value by creating and defending stable ownership. As demonstrated in later Parts, the individuation of the field of property is important, because in addition to defending particular types of value, property law is characterized by particular types of remedies, making it an attractive branch of law for many claims.¹⁴⁰

This Article follows in the footsteps of works by such luminaries as Demsetz,¹⁴¹ Barzel,¹⁴² Steven Shavell,¹⁴³ Robert Ellickson,¹⁴⁴ Carol Rose,¹⁴⁵ and others in viewing property as aimed at enhancing utility,

¹³⁹ See PENNER, *supra* note 30. Penner's work, unlike this one, rejects the contribution of economic analysis of property. *Id.* at 63–67.

¹⁴⁰ See *infra* Parts IV.D and VII.

¹⁴¹ See Demsetz, *supra* notes 107–10.

¹⁴² See BARZEL, *supra* note 117.

¹⁴³ See STEVEN SHAVELL, *FOUNDATIONS OF ECONOMIC ANALYSIS OF LAW* (2004).

¹⁴⁴ See Ellickson, *supra* note 74.

¹⁴⁵ CAROL M. ROSE, *PROPERTY AND PERSUASION: ESSAYS ON THE HISTORY, THEORY, AND RHETORIC OF OWNERSHIP* (1994).

but it introduces some subtle and important differences in the traditional perspectives. First, we focus on the utility-enhancing results of *ownership* rather than *possession*. As shall be discussed, following in the steps of Meir Dan-Cohen,¹⁴⁶ when the law of property creates a status of owner, it generates value that would not exist absent a recognized property relationship. Second, this Article emphasizes the importance of *legal* recognition of an owner as the ultimate value claimant and of the restriction of property to certain types of assets rather than to any legal relationship or any asset. These two facets of the value theory are important to understanding why there is a distinct law of property rather than a unified field of law dealing with all interactions among people in society. Yet, notwithstanding these contributions of the value theory, this Article still relies on key points developed by other theorists, such as viewing property law as essential in creating value through possession, reducing transaction costs for transferring objects, enhancing incentives for investment in developing objects, and providing a baseline for some types of contracts.

B. The Value of Property to an Owner

This Section delineates the various ways in which stable ownership enhances the value an owner receives from an asset. Those uninterested in the details of how property enhances value for the individual owner and for society may proceed to Part II.D.

In a world without property law, people would still have to use objects, and they might still value some objects more than others. They may even be able to maintain a degree of stable possession over them. Each potential possessor of an object would then have to consider the following utility function before determining whether it would be worthwhile to obtain possession. The following equation represents the object's expected utility: $U_o = P_o * (S_o(p) - D_o) - C_o$. U_o represents the expected utility to be obtained from an object; P_o is the aggregate probability of retaining the object (represented as a percentage of the total life of the object during which the acquirer manages to retain possession); $S_o(p)$ is the use value of the object; D_o is the cost of defending the object from potential takers; and C_o is the cost of obtaining the object.

The utility function may also be expressed as the aggregate of the utility to be obtained in any given period, over the sum of all of the periods of ownership. This idea is represented by the following notation:

$$u_i = p_i * (s_i(p) - d_i) - c_i$$

and

¹⁴⁶ See Dan-Cohen, *supra* note 20 and accompanying text.

T

$$U_T = \sum_{t=1} p_t \cdot (s_t(p) - d_t) - c_t = U_o$$

Here, u_t represents the utility obtained by the owner in any given period, and U_T represents the aggregate utility obtained over all periods. Thus, U_T is the equivalent of U_o above. Similarly, p_t is the probability of retaining the object in any given period; $s_t(p)$ is the use value of the object in any given period; d_t is the cost of defending the object from potential takers during that period; and c_t is the cost of obtaining the object in that period.¹⁴⁷

It is evident, then, that the probability of retention and the use value are variables that positively correlate with the owner's utility, whereas the cost of obtaining and defending the object are negatively correlated with the owner's utility. The first question for policymakers is, therefore, how and to what extent the introduction of property law is going to affect these variables. The model initially presumes that policymakers have only one available option for instituting a property law regime. Accordingly, they face a binary choice between having a property law regime and not having a property law regime. Later, we complicate the analysis by examining the issue of the ideal content of property law.

Assume that a basic property system has three chief components. First, it creates a certain legal status. This legal status provides that an asset—a widget, for example—"belongs" to the owner. Second, the legal system defines the meaning of this status. That is, it states that when a widget belongs to the owner, the owner enjoys a given group of rights, powers, and privileges. Third, the legal system attaches certain practical consequences to the violation of property rules. For instance, the legal system may provide for the punishment of trespassers. It is not necessary for purposes of the argument here to assume that all violations will be detected or punished.

What will be the effect of the institution of property on each of the four variables discussed? Begin with C_o , the cost of obtaining objects. The hypothesized property system affects C_o by altering the transaction costs pertaining to two types of information: status information and secondary information that facilitates transactions. Naturally, the creation of status engenders a new type of information about assets, i.e., to whom they belong. The creation of status, however, will

¹⁴⁷ In describing the aggregate utility as the sum of individual owners' utilities, this Article ignores the likelihood of externalities, both positive and negative. The assumption of no externalities is, of course, highly unrealistic, and this topic is later revisited in this Section. In addition, because the utility represented here is aggregated over various owners, there is no need to add a separate function for the utility of sale to higher-value owners.

likely have a very modest effect on information about assets. This is because the creation of status alone does not lower an owner's defense costs. Without enforcement, one's status as owner has little independent meaning. Hence, the effect on cost is contingent in that it relies upon the enforcement mechanism's effectiveness. Stated otherwise, the major effect on C_o —the informational status engendered by our hypothesized property system—relies on the system's effect on another variable— D , the cost of defending the object from possible takers.

We will return to the subject of the cost of defending momentarily. First, however, it is important to discuss the secondary information effects of formalizing property as a legal right. The availability of legal protection enables asset holders to share transactional information, such as the location of the holder, the holder's rights, and the potential terms of exchange with the rest of the world. The availability of such information dramatically decreases the search and transaction costs for third parties. As a result, the overall cost of purchasing property declines. Yet, a possible countervailing effect exists. In the absence of effective protection of property, secrecy would be among the principal defensive measures that asset holders could use to maintain possession. Suppression or concealment of information about assets would increase the search costs of potential takers, thereby increasing the current holder's likelihood of keeping the asset. Thus, absent enforcement measures, it is difficult to determine the net effect of a property system on the cost of obtaining assets. Once the property system includes an enforcement mechanism, however, an information market should arise, which would cause the cost of obtaining objects to decrease.

Defensive costs (denoted D_o), of course, are more directly impacted by the property system's enforcement provision. As public enforcement mechanisms are made available to private property owners, property owners may substitute the public defensive mechanisms for their private protection. The better the public defense, the lower the private investments. Thus, central legal enforcement provides asset holders with the ability to reduce defensive costs significantly. This result obtains even if, as expected, legal enforcement of private property rights is less than 100% effective.

For similar reasons, legal enforcement of property rights should increase the property owner's probability of retaining possession of her property— P_o . The heightened protection effected by legal enforcement makes it less likely that current owners would involuntarily lose their assets. Note that the availability of status recognition and legal enforcement will likely increase the number of voluntary asset transfers in market transactions. Thus, the emergence of voluntary

exchange may well shorten the average ownership term. But because voluntary exchanges increase asset values (enhancing the utility of both seller and buyer), the potential shortening of the ownership term has a net beneficial effect.

The effect of a property system on use value, $S_o(p)$, is also positive. However, it bears noting that the use value is a complex function. Various parameters—including use revenue, operating costs, learning curves, interoperability among assets, and the ability to separate ownership from possession or operation—influence the use value.¹⁴⁸ The existence of a property system does not affect these parameters uniformly. Rather than posit and plot a separate use function showing the interlocking effects of these parameters, this Article examines the broad effects produced by the property system.

Use revenue represents the gross stream of income derived from an asset. It includes both pecuniary and nonpecuniary elements. Use revenue may increase with the institution of legal enforcement. The affordability of legal protection and the corresponding diminution of reliance on self-help defensive measures should increase use of assets and the corresponding revenue stemming from use. The emergence of legal protection not only facilitates more open and frequent uses of assets, it also makes possible the temporary separation of ownership and possession. Without property protection, asset holders would be extremely reluctant to surrender possession because possession would be their only cognizable interest. Any concession of possession would have to be accompanied by sufficient security measures to compensate the asset holder for the impending risk of not having the asset returned. Potential possessors would be equally reluctant to provide adequate securities to the asset-holders, lest their securities never return. Consequently, all property arrangements involving the separation of ownership and possession or use, including lease, bailment, and licensing, would have to rely on barter. Such barter, however, would be extremely rare and difficult to execute because mutually desirable objects of the requisite value may not be available or delivery might be practically impossible.

The possible voluntary decoupling of ownership and possession (or use/operation) increases the use value of assets in several related ways. First, it makes possible the temporary transfer of assets to higher-value users who cannot afford to purchase the assets. One example of this phenomenon involves the common practice of taxi cab

¹⁴⁸ In principle, depreciation and obsolescence may also affect use value. However, because this Article defines P_o as the probability of retaining an asset over an asset's life, we need not concern ourselves with obsolescence and depreciation. Because both obsolescence and depreciation determine the life term of relevant assets, they are already incorporated into P_o .

owners in major cities to giving use rights to non-owner drivers. Leases of manufacturing equipment or commercial and residential real estate provide another example.¹⁴⁹ These widespread practices would not have been nearly as ubiquitous, however, without a system of recognition and enforcement of private property rights allowing for the temporary relinquishment of possession. The taxi cab driver will likely be more skilled at producing revenue from the cab, while the owner is likely more skilled at managing the fleet. The driver's temporary possession thereby enhances revenue produced by the asset. Second, the ability to transfer assets to more skillful users almost invariably entails a reduction in operating costs. The skilled machinery operator, for example, will almost certainly be able to run the equipment at a lower cost than the less skilled owner. Together, these two factors—higher revenues and lower costs—point to greater profits resulting from temporary separations of ownership and possession.

Stable property ownership also allows for increased net use value resulting from learning how best to use an asset. The utility-enhancing effects of stability with respect to learning curves may arise in a number of different contexts. Consider an expensive asset with a large number of attributes, such as an automobile. Over time and because of repeated use, the automobile operator will learn the various tics unique to the vehicle. She will learn, for example, that the brakes respond best to moderate pressure, while the accelerator pedal works best when lightly touched. Acquiring this knowledge, through time, enhances the operator's ability to extract the vehicle's maximum utility. Of course, the benefits of learning positively correlate with the asset's complexity. Thus, for example, when a company's assembly line is comprised of various pieces of machinery, stability in the right to possess produces increased efficient use over time. Naturally, one cannot expect the company's employees to realize the full economic potential of the machinery right away. Indeed, the operation of complicated machinery often requires long training periods, and typically machinery cannot be put to use right away. The acquiring company must let its employees familiarize themselves with each production unit in order for them to understand how it interacts with other pieces in the line. Stable ownership provides the employees with the opportunity to acquire this knowledge. One would expect that without longer-term possession encouraged by property protection, the investment in complex assets that require learning would significantly decrease.

Another advantage of stable ownership is compatibility. As the ownership period of various assets extends, potential interoperability

¹⁴⁹ See *infra* Part VII.C for further discussions of leases and property.

affects the ability to extract utility from other assets. The utility of purchasing a particular car seat, for instance, will be affected not only by the likelihood of continued possession of the seat, but also by the expected possessory life of the car itself. The property system's enhancement of the value of one asset can therefore be expected to have positive multiplier effects as the increased value spreads to other, interoperable assets.

Finally, the property system may add to the asset's use value simply by bestowing the status of ownership, even where there is no change in the expected ability to defend the asset. That is, an asset's owner is likely to receive some value from the realization that society recognizes her as the object's rightful owner. This value, labeled "ownership value" by Meir Dan-Cohen,¹⁵⁰ is wholly separate from the value created by central enforcement. Consider home ownership, for example. The effect of the property system extends beyond the enhanced value resulting from secured possession or even sentimental attachment. Ownership status itself creates independent value for the homeowner.¹⁵¹ Dan-Cohen illustrates the value of "delight in ownership" by describing the utility owners derive from bottlecap collections or collections of otherwise worthless items; he posits that in these cases the collector "does not value owning these items because she values the items, but instead values the items because she owns them."¹⁵²

C. The Value of Property to Society

Thus far, this Article has shown that a property system may enhance the utility of objects to their owners. For policymakers, however, the creation of a property system is not solely related to its effect on individuals. Rather, policymakers must determine whether the public creation of a society-wide property system enhances utility relative to the private and public alternatives, including the possibility of no property system at all.

The first step in analyzing whether a society-wide property system is worthwhile is to extend the analysis conducted previously from the level of the individual to society. Tackling the problem at a societal level reveals that certain network externalities,¹⁵³ free-riding

¹⁵⁰ Dan-Cohen, *supra* note 20, at 1.

¹⁵¹ *Id.*

¹⁵² *Id.* at 3-4. Dan-Cohen would likely disavow this Article's utilitarian analysis of ownership value. Dan-Cohen's account is proudly nonconsequentialist and nonreductionist. *Id.* at 1-2. He analyzes ownership in relation to constitution of the self, and while he recognizes that ownership is constitutive of value, to him this value is tightly linked to an ontological conception of the self. *Id.*

¹⁵³ A network externality exists when the utility a given user derives from the consumption of a good depends upon the number of other users in the same network. Michael L.

problems,¹⁵⁴ and economies of scale¹⁵⁵ and scope¹⁵⁶ suggest both that the public definition of property status and the public enforcement of property rights should be provided.

A property system can be analogized to a communication network, whose value increases with each additional subscriber while the corresponding value each subscriber derives from the network also increases. To begin with, the utility of property status is directly related to the degree to which the property system is known in, and used, by society. Naturally, the more widespread and accepted a property system is by society, the more the system enhances property status. As the number of people aware of and respecting the property system grows, the number of sources of property information also grows. In addition, there is an increased likelihood that social conventions will develop around the labeling of and respect for property status. Conversely, as the number of persons failing to respect the property system shrinks, the likelihood of a competing system sending confounding signals about property status decreases. In this way, a property system is analogous to a communication network.¹⁵⁷

Moreover, property status is prey to free-riding. Once property rights are defined by an influential actor such that one's rights are accepted throughout society, even those not paying for the service of property definition will be able to use the concept of property. If, for example, there is widespread agreement in society that there is such a thing as a property right and that it is obtained by investing labor in an object, everyone who invests labor in an object will likely have her property rights respected, even if she has made no investment in advancing the concept of property rights. A legal property system, in other words, is like many other parts of the legal system in that it can be viewed as a public good.¹⁵⁸ Consumption of its services is nonrivalrous, and there is no effective way of excluding consumers

Katz & Carl Shapiro, *Network Externalities, Competition, and Compatibility*, 75 AM. ECON. REV. 424, 424 (1985). Although we are primarily concerned with positive network externalities (as in the decreased cost per user in most telecommunications systems), networks can also have negative externalities (as in the increased cost per user on an overcrowded freeway).

¹⁵⁴ See ROBERT S. PINDYCK & DANIEL L. RUBINFELD, *MICROECONOMICS* 665 (2d ed. 1992).

¹⁵⁵ For our purposes, economies of scale are increases in the efficiency of a system (decreases in the pro rata cost of the goods or services it delivers) resulting from an increase in the system's size (e.g., the number of users). See *id.* at 231–32.

¹⁵⁶ For our purposes, economies of scope are increases in the efficiency of a system (decreases in the pro rata cost of the goods or services it delivers) resulting from an increase in its scope (e.g., the range of goods or services provided). *Id.* at 220–23.

¹⁵⁷ Notwithstanding the presence of network externalities, there may be a role for competition in defining property rights. However, a full examination of the question is beyond the scope of this Article.

¹⁵⁸ Cf. Rex E. Lee, *Address, The American Courts as Public Goods: Who Should Pay the Costs of Litigation?*, 34 CATH. U. L. REV. 267 (1985).

from using its services. Indeed, in describing public goods as “instances in which marginal private net product falls short of marginal social net product, because incidental services are performed to third parties from whom it is technically difficult to exact payment,” Alfred Pigou had in mind, *inter alia*, intellectual property law.¹⁵⁹

Public enforcement of property systems will also often constitute a public good. Enforcing property rights by monitoring infringements, apprehending transgressors, and prosecuting and punishing violators has the effect of strengthening property value. Generally, property owners cannot be excluded from enjoying the benefit of enforcement through free-riding.¹⁶⁰ Notably, where property owners can be excluded from enforcement benefits—for instance, where enforcement is carried out by social punishments in a tightly knit community—there will be less need for public provision of a property system.¹⁶¹ This insight is at the core of Demsetz’s observation that social interaction regarding property must become sufficiently expensive before a public property system is worthwhile.¹⁶² The result is that, in most cases, the enforcement of property rights is a public good that the state should centrally provide.¹⁶³

¹⁵⁹ See ARTHUR CECIL PIGOU, *THE ECONOMICS OF WELFARE* 183–84 (transaction ed. 2002). The public goods defense of intellectual property rights has proved controversial. See, e.g., Stephen Breyer, *The Uneasy Case for Copyright: A Study of Copyright in Books, Photographs, and Computer Programs*, 84 HARV. L. REV. 281, 340–50 (1970) (arguing against extending copyright protection to computer programs); Benjamin G. Damstedt, Note, *Limiting Locke: A Natural Law Justification for the Fair Use Doctrine*, 112 YALE L.J. 1179, 1219–21 (2003) (arguing that Lockean principles justify limiting intellectual property rights); Jack Hirshleifer, *The Private and Social Value of Information and the Reward to Inventive Activity*, 61 AM. ECON. REV. 561, 573 (1971) (arguing that invention is encouraged by the pecuniary benefits arising from the ability to distribute new information); Roger E. Meiners & Robert J. Staaf, *Patents, Copyrights, and Trademarks: Property or Monopoly?*, 13 HARV. J.L. & PUB. POL’Y 911, 939–40 (1990) (arguing that intellectual property rights are property rights, not monopoly rights); Tom G. Palmer, *Are Patents and Copyrights Morally Justified? The Philosophy of Property Rights and Ideal Objects*, 13 HARV. J.L. & PUB. POL’Y 817, 855–65 (1990) (arguing that “intellectual property rights have no legitimate moral grounding”).

¹⁶⁰ Law enforcement officials could refuse to extend protection to certain types of property owners. But unless the method for refusing can be readily discerned by violators, all property owners will earn the benefits. This is because violators will not know in advance whether the property right they are violating is subject to public punishment or not, and they will therefore assess the risk equally across all assets, whether publicly protected or not. For an example of how defense mechanisms that are externally unobservable protect all owners, see Ian Ayres & Steven D. Levitt, *Measuring Positive Externalities from Unobservable Victim Precaution: An Empirical Analysis of Lojack*, 113 Q.J. ECON. 43, 44 (1998) (discussing and measuring the positive externalities of *Lojack*). Interestingly, where there is systematic bias, a parallel private enforcement may very well arise to provide substitute private property protection.

¹⁶¹ See ROBERT C. ELLICKSON, *ORDER WITHOUT LAW: HOW NEIGHBORS SETTLE DISPUTES* (1991).

¹⁶² See Demsetz, *supra* note 107, at 350 (“[P]roperty rights develop to internalize externalities when the gains of internalization become larger than the cost of internalization.”).

¹⁶³ See, e.g., ADAM SMITH, *AN INQUIRY INTO THE NATURE AND CAUSES OF THE WEALTH OF NATIONS* 653–766 (E. Cannan ed., 1937) (suggesting that because of certain market fail-

Property definition and enforcement may also benefit from economies of scale. Enforcing property rights involves monitoring violations, as well as apprehending, prosecuting, and judging transgressors. Given that a single transgressor typically threatens multiple property owners, centralized enforcement of property rights, which is more easily achieved by the state, could produce these goods more cheaply. A similar analysis applies to apprehension. While monitoring aims at deterring transgressors from carrying out their schemes, and apprehension at incapacitating them, centralized apprehension mechanisms should also prove more cost-effective. Centralized apprehension will reduce the cost of prosecuting repeat violators and enable the specialization of agents to pursue violators more effectively than individual property owners. In particular, the prosecuting and judging of offenders rely on expertise and are characterized by economies of scale. Both prosecuting and judging require proficient knowledge of the legal system and adequate familiarity with the facts of each individual case. Furthermore, judicial decisions give new content and meaning to property rights and thus affect parties beyond those involved in the immediate dispute.

Additionally, economies of scope may exist between monitoring and apprehension. Various monitoring skills reduce the cost of apprehending transgressors. Likewise, familiarity with the physical and social setting of a given community can considerably lower the cost and increase the effectiveness of deterring violations of property rights and apprehending violators. Therefore, from an economic perspective, there are advantages to having the same agents perform both monitoring and apprehension.

Some may argue that the property system as a whole produces negative utility, i.e., it diminishes social welfare on the whole. Such

ures, the administration of justice should be provided by a civil government); Lawrence B. Solum, *Alternative Court Structures in the Future of the California Judiciary: 2020 Vision*, 66 S. CAL. L. REV. 2121, 2173–74 (1993) (arguing that enforcement of a private property system through a public dispute resolution system is a public good that should be provided by the state and not by aggrieved individuals seeking private enforcement through vigilantism); cf. Peter H. Aranson et al., *A Theory of Legislative Delegation*, 68 CORNELL L. REV. 1, 28 (1982) (“Because private-sector decisionmakers will not necessarily supply public goods at efficient levels, such goods may be logical candidates for public-sector production.”); James M. Buchanan & Milton Z. Kafoglis, *A Note on Public Goods Supply*, 53 AM. ECON. REV. 403, 412–13 (1963) (concluding that if a municipal government ceased to provide police or fire departments and instead people hired these services, the “total resource outlay on providing protection to life and property would be greater than under collectivization”). But see Stuart Banner, *Transitions Between Property Regimes* 31 J. LEGAL STUD. 359, 363 (2002) (arguing that enforcement of a property system may not be a public good because the organizers of the system can deny the benefits of the system to certain people by refusing to enforce those people's rights).

claims, however, are difficult to reconcile with the empirical data.¹⁶⁴ Numerous studies have demonstrated that property systems are crucial to the macroeconomic development of countries.¹⁶⁵ Indeed, these works show that long-term economic growth is intimately tied with the creation and defense of stable property rights.¹⁶⁶ Moreover, a recent study shows that stable property institutions are more important to economic growth than contractual ones.¹⁶⁷ Consistent with this Article's theory, the study suggests that the property system is crucial to encouraging societal welfare by creating and defending stable ownership rights in property.¹⁶⁸ Finally, such scholars as Douglass North have provided the theoretical groundwork to the empirical work.¹⁶⁹

A far more interesting question, however, is what the optimal level of property protection should be. Admittedly, the state may provide more property protection than is socially optimal—and indeed, it may even be doing so now. Unfortunately, it is not easy to measure precisely the cost of providing a property system or property protection in any given case or the precise utility of property vis-à-vis any particular asset or owner class. And while the tradeoff of system utility versus transaction cost has not merited extensive examination in general property scholarship, the cost-benefit analysis has been discussed extensively in the intellectual property literature.¹⁷⁰ In the classic treatment of the subject, William Nordhaus demonstrated that the op-

¹⁶⁴ Hernando de Soto, *Preface to THE LAW AND ECONOMICS OF DEVELOPMENT*, at xiii (Edgardo Buscaglia et al. eds., 1997) ("Those nations that have succeeded in developing a market-oriented economy are not coincidentally those that have recognized the need for and secured widespread property rights protected by just law."); Paul G. Mahoney, *The Common Law and Economic Growth: Hayek Might be Right*, 30 J. LEGAL STUD. 503, 523 (2001) ("The . . . results . . . suggest that the strong association between secure property and contract rights and growth is causal, and not simply a consequence of simultaneity."); Todd J. Zywicki, *The Rule of Law, Freedom, and Prosperity*, 10 SUP. CT. ECON. REV. 1, 22 (2002) ("The documented effect of increasing rule of law values on economic growth is robust. Individuals are more willing to invest in economic growth where property rights are stable . . ."); DAN RODRICK, INSTITUTIONS FOR HIGH-QUALITY GROWTH: WHAT THEY ARE AND HOW TO ACQUIRE THEM 5 (Nat'l Bureau of Econ. Research, Working Paper No. 7540, 2000) ("[E]stablishment of secure and stable property rights [was] a key element in the rise of the West and the onset of modern economic growth."), available at <http://www.nber.org/papers/w7540>.

¹⁶⁵ *Id.*

¹⁶⁶ *Id.*

¹⁶⁷ See DARON ACEMOGLU & SIMON JOHNSON, UNBUNDLING INSTITUTIONS 33–35 (Nat'l Bureau of Econ. Research, Working Paper No. 9934, 2003) (demonstrating that property rights institutions are more important determinants of economic performance than contracting institutions), available at <http://www.nber.org/papers/w9934>.

¹⁶⁸ See *id.*

¹⁶⁹ See Douglass C. North, *Dealing with a Non-Ergodic World: Institutional Economics, Property Rights, and the Global Environment*, 10 DUKE ENVTL. L. & POL'Y F. 1, 3 (1999).

¹⁷⁰ See generally WILLIAM D. NORDHAUS, INVENTION, GROWTH AND WELFARE: A THEORETICAL TREATMENT OF TECHNOLOGICAL CHANGE 76–86 (1969).

timal duration of patent protection balances the utility of incentives for innovation against the costs produced by monopoly-induced dead-weight loss.¹⁷¹ Unfortunately, determining where this balance lies in the real world has proved to be elusive.¹⁷² By the same token, it is difficult to imagine empirical studies that would accurately identify the precise tradeoff necessary to achieve the optimal level of property protection.

D. Asset Definition

So far, the discussion regarding the utility of a legal property system has omitted reference to the question of which assets to include in the system. As noted earlier, property is not the only field of law, and not every asset is suitable for property protection. The value theory of property suggests the following central limitation: only assets for which protection of stable ownership will enhance social welfare should come under the aegis of property law. As society changes, the value derived from different assets is transformed, and therefore the objects of property law will change over time. Similarly, as the cost of providing property rights for asset or owner classes changes, the net utility of providing for property rights will change as well.

The theory of property as protecting stable ownership value instantly suggests two types of assets not suitable for protection under the property system: nonmarket goods and goods for which there is no in rem protection. Nonmarket goods are goods that will not appear on the market due to lack of demand (because no one derives any utility from them) or lack of supply (because they may not be cost-effectively protected). An example of an asset for which there is currently no demand is a torn CD wrapper. An asset that may not currently be cost-effectively protected is fair weather. The second category excluded contains goods for which there is no in rem protection. An example of a good falling within this category is a beautiful singing voice. The voice *qua* voice may not be appropriated by third parties.

A different limitation on assets' suitability for property protection stems from asset size and the threat of asset fragmentation. Here, the withholding of property protection is not categorical but individual-

¹⁷¹ See *id.*

¹⁷² In the wake of Nordhaus' early investigations, many others attempted to tackle the problem of optimal patent duration. See, e.g., Richard Gilbert & Carl Shapiro, *Optimal Patent Length and Breadth*, 21 RAND J. ECON. 106, 106 (1990) ("When patent policy is viewed to be a choice of patent breadth as well as patent length, we find that the optimal length may easily be infinite. The appropriate margin on which patent policy should operate may not be patent length, but rather patent breadth."); F.M. Scherer, *Nordhaus' Theory of Optimal Patent Life: A Geometric Reinterpretation*, 62 AM. ECON. REV. 422, 422-27 (1972) (proposing a modification to Nordhaus' original attempts at modeling optimal patent life).

ized. Take ownership in land, for instance. Needless to say, land ownership is a recognized property interest, in principle. However, if the interest is devised to too many devisees or allowed to descend to too many heirs, it may become so fragmented that it loses virtually all of its value. Imagine that Blackacre is a sixteen-acre (2,722.5 ft.²) estate that, after several generations of partitioning and re-partitioning, is divided into 1,249 separate parcels, each less than 2.2 square feet. Practically speaking, the small parcels are unlikely to prove to be commercially useful in any fashion, and it is difficult to imagine the development of any residential use of or sentimental value to this small space. In short, as the asset becomes too small, it is unlikely to have value. In addition, as the asset becomes too small to have any value created or defended with stable ownership, it moves beyond the range of the legal property system. The loss of value in such cases is quite close to the problem Michael Heller dubbed the "tragedy of the anti-commons."¹⁷³ In Heller's examples, Blackacre is not physically divided; rather each of the devisees and descendants receives an increasingly small ownership share of the whole.¹⁷⁴ Thus, each transferee, by virtue of being a co-owner, has veto power over any decision about the use or transfer of the asset.¹⁷⁵ The creation of multiple veto powers, with the attendant holdout problem, often leads to insoluble asset lock-ins and thus causes underutilization of assets.¹⁷⁶ Whether the asset is divided physically, or whether its ownership is divided among many owners, the solution is clear: either recombine the microparcel, or reaggregate the microshares of ownership. Either way, the legal system should discourage stability in ownership until the asset is significant enough that there is value in its stable ownership.

Yet another category of assets unsuitable for property rights results from the cost of providing property protection. One current example of such an asset is ideas. Under the prevailing view, there are no property rights in pure ideas partially because the cost of protection would outweigh the benefit.¹⁷⁷ It must be borne in mind,

¹⁷³ Heller, *Anti-Commons*, *supra* note 4, at 624 ("When too many owners have [the] privileges of use, the resource is prone to overuse—a tragedy of the commons.").

¹⁷⁴ *See id.* at 651.

¹⁷⁵ *See id.* at 652–53.

¹⁷⁶ *See id.* at 653–54.

¹⁷⁷ *See Galanis v. Proctor & Gamble Corp.*, 153 F. Supp. 34, 37 (S.D.N.Y. 1957) ("The general rule of law is that a mere idea is not property . . ."); Stephen C. Carlson, *The Law and Economics of Star Pagination*, 2 GEO. MASON L. REV. 421, 432 (student ed. 1995) ("[T]he administrative costs of defining the idea are quite high. . . . [This is because] [d]etermining the scope of the protected idea would be problematic."); Douglas YBarbo, *On Legal Protection for Electronic Texts: A Reply to Professor Patterson and Judge Birch*, 5 J. INTELL. PROP. L. 195, 216 n. 52 ("[T]he high administrative cost of protecting ideas is no doubt important; it is simply too difficult to determine an idea's source, e.g., whether it is original or not.").

though, that the cost of property protection depends in large measure on available technology; moreover, technological advances may make it cost-effective to create new property rights in as of yet unprotected resources. Technology, then, determines not only the protection's feasibility, but also its effectiveness. The invention of barbed wire, for example, enabled farmers near perfect protection against roaming cattle, consequently enhancing the value of their land.¹⁷⁸ Indeed, it is quite feasible that an asset will become a suitable subject of property law primarily due to reductions in the cost of property protection, rather than due to any changes in the asset's revenue-producing capacity. Conversely, the Napster cases and the digital information revolution seem to suggest that an asset may *cease* to be a suitable subject of property law because of an *increase* in the cost of protecting it.¹⁷⁹

In subsequent sections, this Article demonstrates how property law identifies and restricts property protection to the right kind of assets.¹⁸⁰

E. Property and Contract

A final point should be made about the relationship between contract and property in our understanding of property. As previously noted, modern economic analysis presumes that property is the left-over category when contract is exhausted.¹⁸¹ Coasian economic analysis notes that in a zero transaction cost world, people concerned with the use of a particular asset can arrive at perfectly contingent contracts that efficiently dispose of the asset and render property irrelevant.¹⁸² Thus, the standard pose of such theorists is that of Barzel, who views property as merely setting up default allocations and rights to provide the basis for further bargaining.¹⁸³ To be sure, transaction costs will bar further transacting in some cases, and in such cases

¹⁷⁸ TERRY L. ANDERSON & DONALD R. LEAL, *FREE MARKET ENVIRONMENTALISM* 29–30 (1991) (describing the impact barbed wire had on ranchers in the Western United States when introduced in the 1870s).

¹⁷⁹ See Note, *Exploitative Publishers, Untrustworthy Systems, and the Dream of a Digital Revolution for Artists*, 114 HARV. L. REV. 2438, 2455 (2001) (suggesting that “peer-to-peer file-sharing technology like Napster’s demonstrates the implausibility of street-level enforcement of copyright law generally”); see also David D. Haddock & Lynne Kiesling, *The Black Death and Property Rights*, 31 J. LEG. STUD. 545 (2002) (discussing dropping of assets from property system as a result of the Black Plague).

¹⁸⁰ See *infra* Part IV.A.

¹⁸¹ See *supra* text accompanying notes 115–25.

¹⁸² BARZEL, *supra* note 117, at 7.

¹⁸³ *Id.* at 33–37.

property rules will remain dispositive.¹⁸⁴ The bulk of analysis, however, is not devoted to these residual cases.

In this Article's view, this analysis of the relative importance of contract and property has matters precisely reversed. Typically, an asset has many potential claimants, and perfectly contingent contracts would need to be negotiated among a large number of parties to render property rules irrelevant. Recall our earlier example of the conveyance of an automobile. While the buyer and seller can likely order all of their affairs by contract, they almost certainly cannot extend their contractual network very far into the rest of the world. Indeed, often so many parties would have to be bargained with that contractual solutions are unavailable, and property rules ultimately determine the object's contribution to societal welfare. In other words, only rarely can bargaining be relied upon to produce the efficient use and allocation of assets; in most cases, property law will determine whether social welfare is maximized. Consequently, the rules of property must be carefully tailored to maximize the value produced by property institutions.

III THROUGH THE VALUE PRISM

Having presented the basics of this Article's theory, it is fitting in this Part to acknowledge its intellectual debt to some of the preexisting contributions to property law. This Article's unified theory of value has many theoretic antecedents. As noted previously, a value component in property theory is present in the writings of Locke, Marx, and numerous others, and more recently, in those of Radin and Barzel.¹⁸⁵ Each employs value in a different way. Similarly, this Article not only breaks away from the prior use of value, but in a significant departure from current conceptualist scholarship, the value is utilized as the key component in unifying property as a legal institution. In this Part, the theory developed here is compared with other existing theories ranging from neo-conceptualism to law and economics.

A. Labor Theory of Value

The differences between this Article's use of value and that of Locke and Marx should be readily apparent. Although Locke and Marx proffered radically divergent theories, both viewed value as the

¹⁸⁴ See Abraham Bell & Gideon Parchomovsky, *Of Property and Anti-Property*, 102 MICH. L. REV. 1, 5 (2003) (discussing how transaction costs may bar further transfer of property rights).

¹⁸⁵ See *supra* Parts I.A, I.C, I.D.

connecting link between labor and ownership.¹⁸⁶ The critical premise in their writings was that labor enhances the value of objects, a commonality leading them both to argue that the laborer is entitled to the added value component.¹⁸⁷ Locke used this reasoning to provide a natural rights basis for ownership;¹⁸⁸ Marx used it to argue for empowerment of the proletariat.¹⁸⁹ The labor theory of value was once very influential; its importance, however, has declined. As should be clear to the reader, the value theory presented in this Article does not rely on the labor theory, and the labor component of value has no independent importance here.

B. Value and Personhood

The contrast between this Article's approach and that of Radin warrants more elaboration. Working from a personhood perspective, Radin divided the world of objects into two categories: nonfungible (or personal) and fungible.¹⁹⁰ Nonfungible goods are those that are instrumental in constituting their owners' personalities.¹⁹¹ As a result, nonfungible objects, such as a wedding ring, have a special value for their owners above and beyond the object's market value.¹⁹² Fungible objects, by contrast, lack uniqueness and serve no purpose in constituting the self.¹⁹³ Radin suggested that property law should track this distinction and treat goods differentially based on their classification as personal or fungible.¹⁹⁴ For example, Radin proposed to restrict injunctive relief, or property rule protection, to cases involving personal goods and to offer only compensatory damages, or liability rule protection, in all other cases.¹⁹⁵ Furthermore, while Radin acknowledged that owners may ascribe idiosyncratic value to fungible objects, she derided this phenomenon as "object fetishism" that should not be condoned.¹⁹⁶

¹⁸⁶ See *supra* Part I.A.

¹⁸⁷ *Id.* For an overview of the Marxian labor theory of value, see Fernando Vianello, *Labour Theory of Value*, in *THE NEW PALGRAVE: MARXIAN ECONOMICS* 233 (John Eatwell et al. eds., 1990).

¹⁸⁸ LOCKE, *supra* note 22.

¹⁸⁹ See KARL MARX, *supra* note 23.

¹⁹⁰ Radin, *supra* note 20, at 959–60.

¹⁹¹ *Id.* at 960.

¹⁹² *Id.* at 959.

¹⁹³ See *id.* at 959–60, 986.

¹⁹⁴ *Id.*

¹⁹⁵ See *id.* at 988 ("[T]here would be a nice simplicity in hypothesizing that personal property should be protected by property rules and that fungible property should be protected by liability rules.").

¹⁹⁶ See *id.* at 961 (arguing that the idiosyncratic value people might ascribe to fungible property does not deserve the same level of protection as personal property because "anyone who lives only for material objects is considered not to be a well-developed person, but rather to be lacking some important attribute of humanity").

The model presented here sheds new light on Radin's theory and permits the translation of some of Radin's insights into the language of an economic approach. In essence, Radin's insight regarding the distinction between "personal" or "nonfungible" and "fungible" property may be viewed as a subset to a larger phenomenon: the gap between reserve price and market price. This gap may be due to the sentimental reasons related to what Radin calls "self-constitution" or "personal embodiment."¹⁹⁷ For example, it may be the case that when a wedding ring is lost, the loss "causes pain that cannot be relieved by the object's replacement."¹⁹⁸ In cases of sentimental attachment, the owner finds in the asset emotional utility not accessible to other market participants and, therefore, not reflected in the market price. In other words, the price at which the owner will agree to sell the asset (the reserve price) will exceed the price that ordinary market participants will pay (the market price).

Other elements besides sentimental value may also account for this gap. An owner, for example, may have a unique skill that allows her to extract greater utility from a rare commercial asset. For instance, Alice may be a musician particularly adept at playing period harpsichords from the early 18th century. Because the market for such harpsichords is exceptionally thin and Alice's ability to extract utility is exceptionally high, if Alice's harpsichord is destroyed her loss may well exceed the catalogue price of the harpsichord. Goods whose enjoyment necessitates a learning period provide a different example. Consider again the automobile with the oversensitive acceleration pedal; the learned skill regarding the automobile's operation creates a unique ability in the owner to extract utility from the asset at a low cost. As with the case of sentimental value, the essential feature of all these assets is that they have unique qualities and, therefore, lack perfect market substitutes. This lack of substitutes engenders a rational gap between the owner's reserve price and the market price.

An important distinction must be made here between the rational values that inhere in stable ownership, on the one hand, and the misperceptions in value that are often used to exemplify the "endowment effect" on the other. The endowment effect causes individuals to value goods in their possession more than the identical goods in someone else's possession.¹⁹⁹ At its most basic level, the endowment effect may be viewed as a decisional heuristic that is only sometimes rational. Thus, for example, participants in one famous study were randomly awarded lottery tickets with a potential \$50 payoff or \$3 in

¹⁹⁷ *Id.* at 958.

¹⁹⁸ *Id.* at 959.

¹⁹⁹ See, e.g., Richard Thaler, *Toward a Positive Theory of Consumer Choice*, 1 J. ECON. BEHAV. & ORG. 39, 44 (1980) (discussing the endowment effect theory).

cash.²⁰⁰ The lottery recipients were then given the opportunity to sell the lottery tickets for \$3, and the cash recipients the chance to buy the lottery tickets for \$3.²⁰¹ Remarkably, while 38% of the cash recipients opted to buy lottery tickets, a whopping 82% of lottery ticket recipients rejected the cash offers and kept their tickets.²⁰² This disparity in perceived value of the lottery ticket depended only on possession, leading the study's authors to label such differing perceptions the "endowment effect."²⁰³ At least in this experiment, the endowment effect reflects a decisionmaking quirk or a misperception rather than any rational perception of value. By contrast, sometimes the valuation embodied in the endowment effect reflects a rational assessment that "a bird in the hand is worth two in the bush." As Richard Posner noted, persons in possession of an object may capitalize potential replacement costs in its valuation where the object lacks ready substitutes.²⁰⁴ Indeed, even where the object has close substitutes, the development of habit and familiarity, or sentimental connection, may create rational idiosyncratic value.²⁰⁵ Likewise, owners and possessors may hold more accurate information regarding the object's value.

The value theory developed in this Article addresses all the situations in which a rational gap exists between the owner's reserve price and the market price. The emphasis the theory places on the value of stable ownership implies, *inter alia*, greater protection to people who derive unique value from assets. Notably, two effects of legal property rights—status conferral and enforcement—not only protect the unique value, but also facilitate the creation of such value by enabling owners to develop certain value-enhancing expectations and patterns of behavior.

Before turning to the differences between this Article's and Radin's understandings of value, a significant point of convergence must be recognized. Radin's important insight is that an inquiry into how owners relate to an asset is central to property analysis.²⁰⁶ Radin's treatment expanded preexisting legal analysis by highlighting the need to account for how people value objects irrespective of the legal protection afforded the object's possession. Consequently, in evaluat-

²⁰⁰ Jack L. Knetsch & J.A. Sinden, *Willingness to Pay and Compensation Demanded: Experimental Evidence of an Unexpected Disparity in Measures of Value*, 99 Q. J. ECON. 507, 512 (1984).

²⁰¹ *Id.*

²⁰² *Id.* at 513.

²⁰³ *Id.* at 518.

²⁰⁴ RICHARD A. POSNER, *ECONOMIC ANALYSIS OF LAW* 95–96 (5th ed. 1998).

²⁰⁵ Where there are only close, but not identical substitutes, substantial costs may be involved in learning how to enjoy a substitute item's full value, whereas all such costs in the currently possessed item have already been sunk. Consequently, the marginal cost of continuing to use the possessed item will no longer include the cost of learning how to use it, while such costs will continue to be reflected in market prices.

²⁰⁶ See Radin, *supra* note 20, at 959–60.

ing the desirability of property law, it is necessary to note the broader network of valuable relationships between objects and owners.²⁰⁷

However, the conception of value presented here diverges from Radin's in several important respects. First, Radin's account recognizes no independent importance in the economic value of stable ownership.²⁰⁸ Radin is merely concerned with a special category of objects that promotes the owner's sense of self.²⁰⁹ Thus, Radin's use of value is much more limited. Second, and perhaps most importantly, Radin's use of value involves a normative value judgment—she believes that idiosyncratic value is desirable only with respect to nonfungible (personal) goods; in all other cases, she rejects it as object “fetishism.”²¹⁰ The account of value developed in this Article, by contrast, is descriptive. No judgments regarding the desirability or provenance of idiosyncratic value are made—its existence simply recognized and its value protected. Consequently, Radin's view lacks the explanatory power of property law that this account offers. Finally, for Radin, value provides a means for creating a particular subset of property—nonfungible goods.²¹¹ Here, value plays a much broader role—the unifying theme for all property law.

C. Value and Economic Property

Barzel made a different contribution to the academic discourse on value in property.²¹² Barzel preceded us in placing value in the center of property. Indeed, in some ways, Barzel's theory may be viewed as a radical version of our property theory. The touchstone of Barzel's analysis is “economic rights,” a very broad conception that leads him to view the role of the law as almost trivial.²¹³ To him, the ability to derive value from an asset constitutes an economic property right.²¹⁴ Law functions merely to recognize or fail to recognize this ability.²¹⁵ In keeping with the tradition of Coase, Barzel views contracts as the primary legal institution for extracting value, with property serving as a mere background for exchange.²¹⁶

²⁰⁷ Notwithstanding these criticisms, this model does incorporate some of Radin's insights.

²⁰⁸ Radin, *supra* note 20, at 957–59.

²⁰⁹ See *id.* at 957 (explaining that her article only “explores the relationship between property and personhood . . .”).

²¹⁰ See *id.* at 961.

²¹¹ See *id.* at 959–61.

²¹² See *supra* Part I.C. and accompanying notes.

²¹³ BARZEL, *supra* note 117, at 3 (“Economic rights are the end . . . whereas legal rights are the means to achieve the end . . . I am concerned primarily with economic rights. Legal rights play a primarily supporting role.”).

²¹⁴ See *id.* at 3.

²¹⁵ *Id.* at 4.

²¹⁶ *Id.* at 33.

A brief discussion of Barzel's approach to theft provides a good overview of his property theory. Barzel views ownership as residual claimancy on the value derived from an asset.²¹⁷ The legality of the claimancy is of no consequence to Barzel.²¹⁸ Thus, for example, an automobile is "owned" not only by Betty, whose legal "ownership" is registered with the state, but also by any person who has the potential to realize value in the asset. The list of such people, in Barzel's view, may be endless.²¹⁹ Even legally owned assets generate "value spillovers" for third parties, and all potential value claimants vie for the opportunity to extract value from an asset. As the residual claimant, Betty—who is the legal owner of the automobile—has only a limited right to appropriate the value that "remains" in the automobile after other claimants, including thieves like Charles, satisfy their claims on the automobile.²²⁰ Barzel does not ignore the law. But to him, the law only affects the relative positions of the multiple claimants vis-à-vis one another, making value extraction easier for some and more difficult for others.²²¹ Thus, legal protection may "enhance" the value held by a specific owner and change the relative positions of the various "owners" vis-à-vis one another, but it plays still strictly a secondary role.²²²

Barzel's view fails to take full account of legal property rights. The property system, in our view, not only allocates value among claimants; the property system also creates new value. As shown previously, the creation of the status of legal property, in and of itself, enhances asset value. Yet, property law clearly does not confer the same status on all potential claimants of assets, whom Barzel refers to as "owners." The point and purpose of property law is to separate rightful owners from unlawful claimants, and it is only for the former that property status creates value. Moreover, as Barzel acknowledges, the provision of legal enforcement further enhances the value of assets for their owners.²²³ As will be discussed later, legal enforcement of property rights is designed to keep assets in the hands of legally recognized owners by deterring nonconsensual takings by making them prohibitively costly.²²⁴ Of course, the legal system cannot guarantee a detection rate of one hundred percent—some nonconsensual abuses of

²¹⁷ *Id.* at 3–9.

²¹⁸ *Id.* at 141 ("The lack of legal rights may reduce the value of [property rights], but it does not nullify them.").

²¹⁹ *Id.* at 3 ("The residual claimancy from an asset or an operation is often shared by several individuals.").

²²⁰ *See id.* at 141.

²²¹ *Id.* at 141–42.

²²² *Id.* at 4.

²²³ *Id.* at 141.

²²⁴ *See infra* Part IV.C.

property will go unpunished.²²⁵ Nevertheless, the legal system can offset imperfect detection by imposing harsher penalties to apprehended offenders.²²⁶

To be sure, some of Barzel's insights, though contrary to legal-centric scholarship, cannot be denied. Barzel is correct in noting that even after the law defines ownership, assets continue to have spillover effects such that value is still available to many other claimants.²²⁷ Moreover, Barzel is right in stating that the law is simply one of many possible tools involved in protecting an asset's value.²²⁸ The fact that the law identifies Betty as the owner of her automobile does not prevent Charles from successfully stealing her car when Betty absent-mindedly leaves the key on the front seat. The protection offered by the law is limited to the ability to invoke the law enforcement system, and even this ability is often limited. The result, which is discussed in the next Section, is that legal protection is neither absolute nor costless.²²⁹ As will be shown, there may be times where it is not cost-effective to rely upon the law of property to defend value.

Yet, more broadly, this Article rejects Barzel's approach to the domain of legal property. The conception of property in this Article is one in which a legal property system creates and protects substantial value. For this reason, in focusing solely on the contractually allocated value in assets (or what he terms the "economic rights" in property),²³⁰ Barzel eliminates the essential contribution of a legal framework to the value that inheres in property. Here, property law does more than simply allocate and recognize value produced by "eco-

²²⁵ Barzel makes much of the fact that even those not legally designated to have any status regarding an asset—such as thieves—may nevertheless illicitly enjoy some of the value of an asset. BARZEL, *supra* note 117, at 141. Certainly, it is true that the harm occasioned by some property violations may simply be too small to warrant legal action. Thus, it makes no economic sense for homeowners to pursue legal action against the occasional driver who trespasses on their driveway to make a three-point turn. Nonconsensual tasting of fruit in supermarkets also probably falls in this category. See *id.* at 6. The fact that not all violations of property rights are litigated or prosecuted, however, does not transform the violators into owners of the relevant property. The fruit-tasters do not enjoy any legal protection for their ill-gotten gains, or any cognizable legal status. They have no stability in ownership to rely on; indeed, they have no legally recognized "ownership" at all, and must hide and restrict their gains to levels beneath the true owner's marginal cost of protection. Thus, the distinction between legal property and economic property relies not simply on the obtuseness of the state in failing to recognize certain types of ownerships; rather, legal property constitutes a distinct category with important value-creating aspects.

²²⁶ See Gary S. Becker, *Crime and Punishment: An Economic Approach*, 76 J. POL. ECON. 169, 183 (1968) ("[A] reduction in [the probability of apprehension] 'compensated' by an equal percentage increase in [the level of punishment] would leave [the number of offenses] unchanged . . . but would reduce the loss, because the costs of apprehension and conviction would be lowered by the reduction in [the probability of apprehension].").

²²⁷ BARZEL, *supra* note 117, at 141.

²²⁸ *Id.* at 7-9, 85-104.

²²⁹ *Infra* Parts IV.A, D.

²³⁰ BARZEL, *supra* note 117, at 3.

conomic property.” Rather, the law’s recognition and protection of property rights *creates* value for owners. The stability in ownership afforded by the law creates the possibility for developing new kinds of value in, and uses of, property that would otherwise be unavailable. Legal property, then, must be at the center of property analysis, rather than simply an aside. To Barzel, property owners must share their gains with all other claimants, from contract-holders to thieves.²³¹ This Article’s value theory instead views the owner as the primary beneficiary of value, while others merely benefit from positive externalities. The owner is not merely the main beneficiary of legal protection, but also the one who decides how much to develop the property and how much to invest in self-help measures.²³² Through these means, the owner determines how much value to leave to others and the ease with which they can capture it. Therefore, under the value theory, Barzel has the relationship between property owners and other claimants backwards.

D. Value and Information Theory

Next, the results of the value theory of property presented in this Article are compared with those of an information-based conception. As noted earlier, building on the assumption’s centrality of in rem rights in property, Merrill and Smith argue that property rights come in a fixed number (*numerus clausus*) in order to promote easy and cheap distribution of information about the rights pertaining to assets.²³³ Under Merrill and Smith’s theory, property law aims at an optimal standardization of forms in order to reduce the cost of investigating an asset’s provenance and its attendant rights.²³⁴ Contracts, on the other hand, create only rights in personam.²³⁵ Consequently, because contracts generally do not affect third parties, they do not require standardization.

This Article posits that the value theory offers a different perspective on the contract-property distinction. To see this, consider form contracts. Dataholic Software Company sells its software application in the following package: the software is encoded upon a CD-ROM, which is sealed within an envelope, which in turn is enclosed in

²³¹ *Id.* at 141.

²³² Paradoxically, the owner may even occasionally want to *reduce* the value of property to herself when doing so creates even greater proportional reduction in the property’s attractiveness to outside claimants. See Douglas W. Allen, *The Rhino’s Horn: Incomplete Property Rights and the Optimal Value of an Asset*, 31 J. LEGAL STUD. 339 (2002). For example, students on college campuses that are prone to bicycle theft have been known to deface their bicycles intentionally by scratching the paint or removing decals. The intention, of course, is to make their bicycles appear less attractive to would-be thieves.

²³³ See *supra* Part I.E.

²³⁴ See Merrill & Smith, *Numerus Clausus*, *supra* note 4, at 8.

²³⁵ See Merrill & Smith, *Property/Contract Interface*, *supra* note 4.

shrink-wrap. On the outside of the envelope appears a standard form contract, informing the purchaser Elaine that by opening the envelope, she is agreeing to the contractual licensing terms printed inside.²³⁶ Obviously, there is neither an opportunity for Elaine to bargain with Dataholic regarding these contract terms, nor is there an opportunity for Elaine to inspect them before consummating her purchase. With such a wide information gap between seller and buyer, there exists a strong argument for legal policing of contract terms or mandatory disclosure in order to produce optimal standardization of the contract. Although the need for information necessitates a rule of *numerus clausus*, this does not alter the fact that a form contract is not property.²³⁷ Property law does not govern the form contract, and, moreover, the form contract does not need in rem protection. This result is fully consistent with the value perspective adopted by this Article.

The value perspective provides a useful way of distinguishing property law from other legal fields, including contracts. In order to determine which assets are appropriate subject matters of property law, one can simply pose the question: would a taking of the physical embodiment of the asset substantially deprive the holder of the value? If the answer is yes, then the asset should receive in rem protection and consequently be considered property. Two caveats are in order here. First, not all legal entitlements that receive in rem protection fall under the rubric of property. Second, the takings test does not require a taking of the entire value. Stealing a company's pollution permit or a taxi-cab driver's medallion²³⁸ imposes the cost of getting a replacement, but in neither case is the value of the underlying asset substantially diminished, making these assets worthy of in personam protection. Of course, the state may artificially create assets—such as

²³⁶ This description of the location of the contract terms closely approximates industry practice. See, e.g., *ProCD, Inc. v. Zeidenberg*, 86 F.3d 1447, 1449 (7th Cir. 1996) (describing the use of "shrinkwrap licenses," and ultimately upholding their validity). For criticism, see Julie Cohen, Lochner in Cyberspace: *The New Economic Orthodoxy of "Rights Management,"* 97 MICH. L. REV. 462, 487 (1998) (criticizing the Seventh Circuit's reasoning in *ProCD* in part because "the opportunity to engage in comparison shopping, so important to the court in theory, does not seem particularly attractive if one must purchase each product to learn the terms governing its use").

²³⁷ Significantly, the laws of many foreign countries provide for regulatory preapproval of form contracts. See, e.g., Standard Contracts Law (Isr.) 1982, 37 L.S.I. 6 (1982-1983) (allowing users of form contracts the opportunity to obtain government approval of certain types of "restrictive terms" and immunizing such approved terms from judicial invalidation for a limited time). See generally Larry Bates, *Administrative Regulation of Terms in Form Contracts: A Comparative Analysis of Consumer Protection*, 16 EMORY INT'L L. REV. 1, 44-90 (2002) (discussing treatment of form contracts in the United Kingdom, Germany, Sweden, and Israel); Arthur Lenhoff, *Contracts of Adhesion and the Freedom of Contract: A Comparative Study in the Light of American and Foreign Law*, 36 TUL. L. REV. 481 (1962) (discussing the various ways in which foreign countries approach form contracts).

²³⁸ See *infra* notes 269-73.

bearer bonds or cash—that carry their value in their physical embodiment and consequently necessitate in rem protection.

Employing the nonconsensual taking test developed in this Article, one can see that standard form contracts do not need in rem protection. Stealing the preprinted form that specifies the contractual terms does not substantially deprive the software owner of value. In fact, because the software company prints the contract in the thousands (or millions), even the evidentiary value of any given envelope is nil, while the replacement cost is restricted to the value of the paper.

Merrill and Smith are not wrong in demonstrating the link between information and optimal standardization. Rather, this Article seeks only to show that this link has little to do with the law of property, *per se*.

IV

REORDERING PROPERTY

As shown in Part I, confusion now reigns regarding all aspects of property—its purpose, its nature, and its enforcement. In Parts II and III, this Article sought to reintegrate property by proposing a unified theory of property based on the idea that property is a legal mechanism designed to create and defend certain types of value. The aim here is two-fold. First, the chief concerns of any theory of the law of property are identified, thereby providing a centralized framework for evaluating competing claims. Second, this Section illustrates that careful attention to the importance of value—in particular, the value that inheres in stable ownership—to the theory and law of property can answer all four of the central property questions posed by the framework of this Article.

The exposition here begins by explicating the four foundational questions of property theory. To understand what distinguishes property from other legal fields, it is first necessary to enumerate its essential characteristics. In contrast to current scholarship's seeming aim of fragmenting the field,²³⁹ this Article's goal is to create a unifying logical structure. This Article posits that the field of property, of necessity, addresses four interlocking questions. Specifically, the law of property must address these elements: (1) what things property law protects;²⁴⁰ (2) *vis-à-vis* whom; (3) with what rights; and (4) by what

²³⁹ See, e.g., STEPHEN R. MUNZER, *A THEORY OF PROPERTY* 31–36 (1990) (criticizing the “claim that . . . the notion of property is too fragmented to allow for a general theory”).

²⁴⁰ We should make several semantic notes here. First, in using the term “thing,” this Article does not seek to restrict property to physical items. Rather, any item which can be the locus of the types of value with which property is concerned can be labeled a “thing,” including intangible items such as ideas. Second, in referring to a person, this Article is

enforcement mechanism. These questions are discussed in order, with two central aims—to demonstrate that this Article's framework provides an indispensable prism for evaluating extant scholarship's fit with a holistic understanding of property, and to show that value illuminates each of the four elements in the holistic perspective constructed by this Article.

Before turning to the discussion of the four questions, it is paramount to emphasize that it is the combined discussion of all four questions that shapes the realm of property. The particular discussion of each question adds an element to the property edifice this Article seeks to construct. As befits a holistic approach, each question is but a step towards the ultimate goal of redefining property as a field—no single question can accomplish this task.

A. Which Assets

As noted in Part II, the traditional conception of property as thing-ownership faded in the last century and has been replaced with the new conception of property as an "abstract bundle of legal relations."²⁴¹ Indeed, time has proved that a "thing" oriented conception of property poses real difficulties in a world where the law of property is often applied to legal abstractions such as patents and copyrights. In the information age, where the most valuable property rights are often found in intangible goods, "thingness" is ever more remote from the law of property.²⁴²

Yet, as many scholars have noted,²⁴³ the idea of property as "things" has continued to maintain its hold on the popular imagination.²⁴⁴ The importance of this phenomenon extends beyond the se-

not referring only to a "natural person;" corporations and other types of organizations may be considered persons. Finally, to avoid excessively cumbersome formulations, the Article generally refers to both person and thing in the singular, even in cases where the property relationship could also apply to multiple persons or things. On this last point, however, the reader should bear in mind that in many ways the ideal property relationship is between a single owner and a thing. This is because where property is fragmented among many owners, interproperty conflicts may arise.

²⁴¹ See Michael A. Heller, *Three Faces of Private Property*, 79 OR. L. REV. 417, 429–31 (2000) (surveying the transformation of property from "thing-ownership" to a "bundle of rights").

²⁴² For a recent call to revive this conception in patent law, see John R. Thomas, *The Post-Industrial Patent System*, 10 FORDHAM INTELL. PROP. MEDIA & ENT. L.J. 3, 10 (1999) (stating that patent law is concerned with "the physical instantiation of technological knowledge rather than that knowledge itself"); see also John R. Thomas, *The Patenting of the Liberal Professions*, 40 B.C. L. REV. 1139, 1147 (1999) (discussing judicial and Patent Office reliance on this conception of physical instantiation in patent law).

²⁴³ See *supra* note 20.

²⁴⁴ See, e.g., MUNZER, *supra* note 239, at 23, 74 (finding "the popular conception, which views property as things, is not, as some philosophers and lawyers might think, wholly misguided," due to the "essential materiality of property"); cf. Grey, *supra* note 5, at 76–79 (suggesting that although lay people naively cling to a unitary, objective, physicalist ideal,

mantic confusion created by the popular usage of “property” as a term for things and the technical usage of the term “property” to denote legal rights related to those things. The popular view, in fact, reflects the accurate perception that the law of property has an important relationship to things. Thus, laypersons see property as a right in rem—a characterization addressed in the next Section—and recognize that property rights do not exist in the absence of a “thing” to which they can attach.²⁴⁵

It is crucial to clarify that in the context of property, the term “thing” extends beyond physical objects. Property’s usage of the concept of “thing” is capacious, including not just tangible items but also ideas and qualities.²⁴⁶ Accordingly, intangible goods such as ideas,²⁴⁷ expressions,²⁴⁸ or symbols²⁴⁹ may be proper subjects of property law. Moreover, as demonstrated later, while the restriction of property to things is not meaningless, in practice there do not appear to be real assets in the world to which property categorically cannot apply because of the absence of a “thing.” Employing the value theory of this Article demonstrates this.

To remind the reader, the value theory of property presented here maintains that the institution of property creates and protects the value inherent in the stable ownership of assets. This definition implies the first limitation on property law: where stable ownership of assets provides no greater value, protection of rights in the asset lies beyond property law, and no one should be able to claim property rights in such assets. In theory, this means that no property rights should be recognized for abundant assets—i.e., where the assets may be obtained costlessly and all conceivable demand for them is met. In practice, however, infinitely available and costlessly obtained goods are not found.

Consider the example of air. At one time, we might have thought of air as the infinitely available, costlessly obtained asset. One might

they will eventually accept the specialist view of the disintegrating nature of property, and property will lose its traditional inspirational role).

²⁴⁵ See Wendy J. Gordon, *An Inquiry into the Merits of Copyright: The Challenges of Consistency, Consent, and Encouragement Theory*, 41 STAN. L. REV. 1343, 1380 (1989) (describing the need for a physical embodiment in copyright with “‘works of authorship’ . . . ‘fixed’ in ‘a tangible medium of expression’”).

²⁴⁶ See THE AMERICAN HERITAGE DICTIONARY OF THE ENGLISH LANGUAGE 1864 (4th ed. 2002) (listing among the definitions of “thing”: “1. An entity, an idea, or a quality perceived, known, or thought to have its own existence 2.b. An entity existing in space and time 3. Something referred to by a word, a symbol, a sign, or an idea; a referent”).

²⁴⁷ See 35 U.S.C. § 101 (2004); P. Kanagavel, *Intellectual Property Rights: A Comprehensive Overview*, 85 J. PAT. & TRADEMARK OFF. SOC’Y 663 (2003). Intellectual property rights, of course, are not available for *all* ideas, expressions and symbols.

²⁴⁸ See 17 U.S.C. § 101 (2002); Kanagavel, *supra* note 247.

²⁴⁹ See 15 U.S.C. § 1125 (1999).

think of air as an inexhaustible resource; Frances may breathe all she wants, without ever reducing the air supply available to Gloria or to future generations. It would seem pointless to the point of absurdity, therefore, to allow for the possibility of property rights in air. As it turns out, however, air is neither infinitely available nor always costlessly obtained. If Heavyhanded Enterprises should decide to open several large coal-fired plants, Ivy who lives nearby may find her air is no longer so freely available. Similar observations might be made about other apparently abundant resources, including water. Generally, it seems unlikely that any inexhaustible and costlessly obtainable resource exists.

Economically minded readers may notice the similarity with the concept of public goods. The term public good denotes goods whose consumption is nonrivalrous and whose benefits are non-excludable.²⁵⁰ Nonrivalrous consumption means that consumption of the good by one person does not rival consumption by another.²⁵¹ In practice, this means that the good is inexhaustible, like the example of air. Nonexcludability refers to the inability of the good's owner to exclude consumers.²⁵² The result of these two features of public goods creates the need for government provision; that is, other than altruists, private persons would provide only those goods from which they could enjoy sufficient benefits to warrant the provision.²⁵³ In saying that inexhaustible goods are not a good subject of property law, we are implying that pure public goods would not properly be considered property. Pure public goods, however, do not exist in the real world. As Buchanan observed, "the elements of demand for any good, whether this be classified as wholly, partially, or not at all 'public' by the standard criteria, may be factored down into *private* and *collective* aspects."²⁵⁴ Air, for example, has aspects of both a private good and a public good. As such, it cannot categorically be excluded from the realm of assets to which the law of property applies.

To be sure, not all assets fall within the realm of the law of property. But, this is not because of their intrinsic unsuitability as im-

²⁵⁰ See *supra* Part I.C. Not all agree on the precise definition of public good. Harold Demsetz has argued that a good is a public good solely on the grounds of nonrivalrous consumption. To Demsetz, a public good which satisfies the additional condition of non-excludability is a "collective good." Harold Demsetz, *The Private Production of Public Goods*, 13 J.L. & ECON. 293, 295 (1970); see also RICHARD CORNES & TODD SANDLER, *THE THEORY OF EXTERNALITIES, PUBLIC GOODS, AND CLUB GOODS* 6-7 (1986).

²⁵¹ *Id.* ("If . . . an agent's consumption of a unit of a good fully eliminates any benefits that others can obtain from that unit, rivalry . . . is person.").

²⁵² *Id.* ("Benefits that are available to all once the good is provided are termed nonexcludable.").

²⁵³ *Id.*

²⁵⁴ JAMES M. BUCHANAN, 4 *THE COLLECTED WORKS OF JAMES M. BUCHANAN: PUBLIC FINANCE IN DEMOCRATIC PROCESS: FISCAL INSTITUTIONS AND INDIVIDUAL CHOICE* 21 (1999).

proper "things" to be viewed as property. Rather, as we shall see in the following section, it is due to their inability to be properly protected by a regime of in rem rights.

B. Vis-à-vis Whom

When Blackstone described property as the law of things,²⁵⁵ he was reflecting the historical understanding of property as creating rights in rem, i.e., against the rest of the world. In time, however, the in rem characterization was eclipsed by Hohfeld's argument that any in rem right is essentially a multiplicity of in personam rights.²⁵⁶ In time, Hohfeld's analytical move was viewed as stripping the in rem characterization of any importance in property law.²⁵⁷ Thus, the dominant description of property law became a collection of rights varying with the "sticks" included in the bundle and with the persons against whom such "sticks" are effective.²⁵⁸

Recently, Merrill and Smith have sought to revive the primacy of the in rem aspect of property law.²⁵⁹ As the reader may recall, Merrill and Smith's theory posits that property is a right in rem and expounds the informational implications of this characterization.²⁶⁰ It is critical to note, however, that Merrill and Smith do not explain why property creates rights in rem; they simply assume that it does. While Merrill and Smith's attempt to highlight the informational component of property law is commendable—and this Article joins in their effort to restrict the law of property to in rem rights—this Article's aim is broader. It is to step back and provide an explanation for why property rights must be in rem. This Article shows that in rem rights are important to property not simply for taxonomic reasons *a la* Hohfeld,²⁶¹ nor for reasons of notice *a la* Merrill and Smith;²⁶² rather, it demonstrates that in rem rights are crucially important to defend the value lying at the heart of property protection. Thus, the value theory of property indicates why protection of in rem rights is singularly the most important item in defining a legal right as based in the law of property. One important result is that a value-based explanation provides a better screen for distinguishing between property and nonproperty rights than an explanation based in information provision.

²⁵⁵ BLACKSTONE, *supra* note 68, at Chap. 1.

²⁵⁶ Hohfeld II, *supra* note 76, at 718–33.

²⁵⁷ See *supra* note 85 and accompanying text.

²⁵⁸ See *id.*

²⁵⁹ See *supra* notes 134–38 and accompanying text.

²⁶⁰ See *supra* Part I.E.

²⁶¹ See *supra* notes 76–82 and accompanying text.

²⁶² See Merrill & Smith, *Property/Contract Interface*, *supra* note 4, at 790–91; *supra* Part I.E.

To understand how the value theory underscores the importance of in rem rights in property law, it is necessary, once again, to reiterate the locus of value that is both created and protected by property law under the value theory: stability of ownership. Under the value theory, in rem rights have a primarily creative force; in rem protection establishes the possibility of maintaining value in stability and often by sentiment. To illustrate, let us return to the example of air employed in the previous section. Imagine that Joyous Enterprises decides to market a new product called Summit Air. The company sends representatives to the Himalayan peaks to scoop air into hermetically sealed cans.²⁶³ The sealed cans are then sold in Joyous Outlet Stores, where consumers are advised to open the cans close to their faces to enjoy a brief whiff of mountain air. Here, as with Heavyhanded Enterprises in the previous section, Joyous Enterprises has captured the value of air—an asset of value that may properly be the subject of property law. The question now, is whether Joyous should have in rem rights in its cans of air or whether in personam rights will suffice. The obvious answer is that in rem rights are necessary to defend the value of the cans of air. If Joyous lacked in rem rights, significantly fewer cans would appear on the market, if any appeared at all.²⁶⁴

In a world without in rem rights, Joyous (and everyone else) would have to contract with every potential transferee, whether consensual or nonconsensual, to create a legal in personam means of transferring possession. The result would be one in which only a few persons could enjoy stable possession rights. Joyous, for example, might contract with all of its employees not to take the cans. It might even place a security guard outside its Outlet Stores and require all entering consumers to agree to pay for any merchandise removed from the premises. Consumers, however, could not possibly enter into contracts with every possible taker upon leaving the store. As a result, the only consumers for Joyous' Summit Air would be those consumers who wished to breathe the air within the store or those for whom it was cost-effective to protect the cans outside of the store without any benefit from the law.

Thus, in rem rights constitute a mechanism for protecting value encapsulated in stable ownership of assets and provide a measure of legal protection for asset value that any holder may enjoy. The result

²⁶³ While the example may sound somewhat exotic, the reader is invited to consider the example of Christian pilgrims who bottle water from the Jordan River in order to enjoy baptismal waters from the "Holy Land." The water is entirely unremarkable—except, perhaps, for its lack of cleanliness—but for its provenance.

²⁶⁴ Without in rem rights, potential possessors of the cans would have a lower probability of retaining the cans and an increased cost of defending them from potential takers, thereby lowering the overall value of the utility function and persuading potential customers that purchasing cans of air would not be worthwhile. See *supra* Part II.B.

is that in rem protection is indispensable for realizing the full potential value of the asset.

We may contrast this with an example of an in personam right in the same asset. Consider air rights once more. This time, however, the focus is on the tradable pollution mechanism employed in environmental protection statutes. These provisions depart from the usual regulatory limitations on pollution emissions, seeking instead to establish a market in pollution rights by allowing polluters to purchase regulatory rights from other polluters. Imagine that both Katastrophic Kilns and Lovely Lava are manufacturers whose emissions of sulfur dioxide are regulated by the Clean Air Act.²⁶⁵ The Act establishes a maximum tonnage of sulfur dioxide emissions from all factories in the contiguous States and the District of Columbia.²⁶⁶ Individual emitting factories must possess the necessary permits to cover their expected emissions, which they may purchase from a government auction or from other permit owners.²⁶⁷ Lovely Lava examines the market for emission permits and determines that it is more efficient to install new scrubbers to reduce emissions. Katastrophic Kilns, on the other hand, calculates that purchasing permits is the cheaper route. Katastrophic Kilns therefore buys Lovely Lava's permits.

Should the permits be protected by property law? The in rem nature of property law dictates a negative answer, and the value theory explains why. The permits themselves do not embody an in rem right. The relevant right to pollute is granted by the regulatory authority and it is enforceable only against that authority. Thus, if the CEO of Miserly Manufacturers were to break into the headquarters of Katastrophic Kilns and steal the permits, she would not have acquired any right to pollute nor would Katastrophic Kilns have lost any. The rights embodied in the permits, in other words, are in personam rights that move not with the object, but through authorized channels approved by the regulatory agency. The value theory explains why this is the right result: the permit documentation is merely paper evidence of the right, rather than the right itself. Theft of the documentation is therefore theft only of paper, which conveys no rights.²⁶⁸ With no value of stability in ownership at stake, there is no reason to employ the law of property. Indeed, even if Katastrophic Kilns received no rights to possess the paper, it would still not lose any of its administrative rights.

²⁶⁵ 42 U.S.C. § 7651 (2002).

²⁶⁶ See *id.*

²⁶⁷ See Lisa Heinzerling, *Selling Pollution, Forcing Democracy*, 14 STAN. ENVTL. L.J. 300 (1995) (summarizing and criticizing Clean Air Act's emission trading program).

²⁶⁸ The sheet of paper, on the other hand, is an asset whose value is lost in unstable ownership, and is, therefore, an asset defended by the law of property.

We may advance the value understanding of the importance of in rem rights by considering a set of additional examples. First, consider a case in which the paper permit stolen by Miserly Manufacturers actually conveyed the right to emit sulfur dioxide, rather than merely serving as evidence of the right. Indeed, many types of papers have the power to dispose of the value they represent. Bearer bonds and many negotiable instruments, for example, pay a sum of money to the bearer of the instrument—the paper itself contains the right to receive the money, rather than merely serving as evidence of a debt.²⁶⁹ Bearer bonds, therefore, are best treated as property themselves, rather than as evidence of an in personam claim; bearer bonds' transferability and value depends on a bearer being able to rely on legally protected stability in ownership. Similarly, if the regulatory authority invested in emissions permits the power to emit sulfur dioxide, rather than merely making them evidence of the power to emit, the permits would best be seen as property themselves. One could conceive of a legal regime under which any person who presents a pollution permit would be entitled, without more, to the emission units specified in the permit. In this scenario, the classification of pollution rights would change from rights in personam to rights in rem.

The broader insight provided by these examples is that the regulatory authority has the ability, by defining the administrative right, to create either in rem property rights or in personam rights. This offers an important refinement to Charles Reich's classic *The New Property*.²⁷⁰ Reich observed that in modern times, a great deal of wealth is created and distributed by the government through administrative processes.²⁷¹ He labeled such assets "new property."²⁷² The analysis in this Article, however, demonstrates that Reich's classification is only partly accurate. While Reich was correct in noting that regulatory authorities may create new property, one should not group all wealth-

²⁶⁹ See *South Carolina v. Baker*, 485 U.S. 505, 507 (1988) (

Historically, bonds have been issued as either registered bonds or bearer bonds. These two types of bonds differ in the mechanisms used for transferring ownership and making payments. Ownership of a registered bond is recorded on a central list, and a transfer of record ownership requires entering the change on that list. The record owner automatically receives interest payments. . . . Ownership of a bearer bond, in contrast, is presumed from possession and is transferred by physically handing over the bond. The bondowner obtains interest payments by presenting bond coupons to a bank.

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²⁷⁰ Reich, *supra* note 2 (classifying government largesse as the new property and advocating for protection for the rights associated with it).

²⁷¹ *Id.* at 734-37.

²⁷² *Id.* (including all forms of government largesse, from welfare benefits to federal Social Security and taxicab medallions).

enhancing or transferring administrative rights under the heading of property.²⁷³

In rem protection may also extend to intangible items such as ideas and expression. In such cases, does this Article's test hold? The Article posits that intangible property may be examined by means of the "taking test," at least in theory. Imagine, for instance, that in the future a mind-reading device is created. In this futuristic world, any person in possession of the device can steal another's ideas at will. Assume, now, that Naïve Nancy comes up with a brilliant tune for her next blockbuster album. Excited, she calls her best friend, Overbearing Otto, and breaks the news to him. Before the call reaches its conclusion, Otto takes out his personal mind reader, presses the appropriate buttons and downloads the song directly into his dull mind. Otto then records the song and performs it for pay, diluting the market for Naïve Nancy. Otto has thus succeeded, by means of a taking, in reducing the value of the song for Nancy while greatly increasing its value to him. While this example seems like a strange cross between *Johnny Mnemonic* and *Men In Black*, it teaches a valuable lesson. There are items in the world, such as the emissions permit in the previous example, whose appropriation—even in the most outlandish futuristic scenario—would not convey value. Thus, a sharp divide exists between assets for which in rem protection may add value and those for which it would not.

Of course, the law of property conforms to the world as it is, rather than the world as it might be. Thus, while the music in Naïve Nancy's head is, in theory, an appropriate subject for in rem protection, there is no need to extend such protection in a world without

²⁷³ Adding yet more confusion to the picture, courts have, for many years, interpreted "property" extraordinarily broadly for purposes of the Due Process Clauses, U.S. CONST. amends. V, XIV. As the Supreme Court made clear in *Board of Regents of State Colleges v. Roth*, 408 U.S. 564, 571–72 (1972), "property interests protected by procedural due process extend well beyond actual ownership of real estate, chattels, or money." For purposes of the Due Process Clauses, "property" has been stretched to include such non-property interests as the right to police protection arising from a court order, *Gonzalez v. City of Castle Rock*, 366 F.3d 1093 (10th Cir.) (en banc), cert. granted sub nom. *Town of Castle Rock v. Gonzales*, 125 S. Ct. 417 (2004), continued public employment, *Perry v. Sindermann*, 408 U.S. 593, 602–03 (1972), free education, *Goss v. Lopez*, 419 U.S. 565, 574 (1975), driver's licenses, *Bell v. Burson*, 402 U.S. 535, 539 (1971), and professional licenses, *Barry v. Barchi*, 443 U.S. 55, 64 (1979). A full survey of the scope and meaning of "property" in the context of the Due Process Clauses is beyond the scope of this Article. It should be clear, however, that the case law does not employ "property" in the ordinary sense of the concept. Rather, "property" in this context encompasses legally protected entitlements of any kind, and thereby "endorse[s] a method of pure positivism in identifying constitutional property." Thomas Merrill, *The Landscape of Constitutional Property*, 86 VA. L. REV. 885, 922 (2000); see also Edward L. Rubin, *Due Process and the Administrative State*, 72 CAL. L. REV. 1044, 1087 (1984) (arguing that in many Due Process cases, "the property designation was meaningless" and "[l]iberty and property are simply not useful concepts in this context").

mind-reading machines. Indeed, the law declines to extend property protection to copyright, absent a physical embodiment of the expression.²⁷⁴ Admittedly, the physical embodiment of an expression does not partake of precisely the same qualities as an ordinary physical asset. If Peter, for example, were to steal Quincy's laptop, the entire value of the asset would transfer from Quincy to Peter.²⁷⁵ The case of a copyright is rather different. If Ralph wanted to steal the copyright of Stephanie's book, he would find that doing so is impossible. True, Ralph could deprive Stephanie of some of the value of the copyright by printing counterfeit copies and putting them on the market. But that action would only dilute some of the value Stephanie would derive from her copyright. Note that Stephanie too cannot concentrate the entire value of the copyright in a single object and protect it adequately. In general, while an asset with no tangible expression whatsoever is a poor candidate for property protection, an asset might be a worthy aspirant for property rights even in the absence of complete physical expression of the asset's value. The determining factor is whether the physical expression contains a substantial portion of the value—as if Overbearing Otto were to steal Naïve Nancy's first recording of her tune—or is merely an empty symbol of the asset—as with Katastrophic Kilns's emission permit stolen by Miserly Manufacturers.

Most importantly, this test offers a convincing rationale for why contracts should be considered as creating rights in personam. Assume that Toni and Ursula enter into a contract for computer services. Victor, Toni's envious competitor (and law school dropout), decides to break into Toni's office and steal a copy of the contract in the hope of harming Toni. Unfortunately for Victor, his fiendish plan is foiled by his analytical confusion. Clearly, stealing Toni's copy of the contract is not going to deprive her of any substantial value—in fact, it will probably deprive her of no value whatsoever. Not only is the physical contract in this case merely evidentiary, but also Toni could insure herself against Victor's (and others') folly by making several copies of the contract and storing them in different places. Because nonconsensual takers of contract copies cannot eviscerate the value inherent in the deal for the contracting parties, contracts do not necessitate in rem protection.

²⁷⁴ See Gordon, *supra* note 245. Similarly, in the real world, patent protection will not obtain in the absence of some tangible evidence of the idea. See, e.g., *Pfaff v. Wells Electronics, Inc.*, 525 U.S. 55, 60–63 (1998) (discussing Alexander Graham Bell's grant of a patent on the ground that his idea was complete and supported by a description and drawings).

²⁷⁵ This assumes, of course, that Peter need not fear that Quincy will recover the stolen computer.

C. Which Rights

The “bundle of sticks” conception views property law as creating an almost random variety of rights and duties that the law recognizes in the standard owner.²⁷⁶ While Honoré’s list of ownership “incidents”²⁷⁷ has been extremely influential,²⁷⁸ there is little agreement among scholars as to the relative importance of each stick in the bundle²⁷⁹ or even as to the usual bundle’s contents.²⁸⁰ The confusion has arisen in particular in several specific contexts. For instance, in the field of regulatory takings, many scholars have despaired of the possibility of determining how many property rights must be “taken” by

²⁷⁶ Cf. Jeanne L. Shroeder, *Never Jam To-day: On the Impossibility of Takings Jurisprudence*, 84 GEO. L.J. 1531, 1554 (1996) (arguing that despite the metaphor’s own implication, “property is not a random or arbitrary collection of disparate rights”).

²⁷⁷ See Honoré, *supra* note 17, at 113.

²⁷⁸ See, e.g., Penner, *supra* note 85, at 713 (noting that Honoré’s incidents and “[t]he bundle of rights analysis of property . . . serve[s] as a ‘dominant paradigm’ under the aegis of which working lawyers and academic theorists may attend to particular problems in the law of property”); Note, *Distributive Liberty: A Relational Model of Freedom, Coercion, and Property Law*, 107 HARV. L. REV. 859, 861 n.5 (1994) (noting, with respect to Honoré’s eleven incidents of property, that “[d]espite its oversimplicity, this conception still operates as a background understanding of property.”).

²⁷⁹ Compare Teena-Ann V. Sankoorikal, *Using Scientific Advances to Conceive the “Perfect” Donor: The Pandora’s Box of Creating Child Donors for the Purpose of Saving Ailing Family Members*, 32 SETON HALL L. REV. 583, 589 (2002) (“Under the ‘bundle of rights’ framework, the hallmarks of a property right include the ability to control something and the ability to prevent others from interfering with that control.”), with Sarah Harding, *Justifying Repatriation of Native American Cultural Property*, 72 IND. L.J. 723, 759 (1997) (writing, “the familiar notion of a bundle which includes an abundance of rights, most prominently, the rights to possess, use, capitalize on, and exclude others . . .”), and Arun S. Subramanian, Note, *Assessing the Rights of IRU Holders in Uncertain Times*, 103 COLUM. L. REV. 2094, 2098 (2003) (suggesting that in analyzing indefeasible rights of use—a transactional form common in the telecommunications industry—under a bundle of rights framework “there are four important factors to consider: (1) use, (2) physical occupation, (3) control, and (4) economic possession”).

²⁸⁰ See, e.g., Craig Anthony (Tony) Arnold, *The Reconstitution of Property: Property as a Web of Interests*, 26 HARV. ENVTL. L. REV. 281, 285 n.20 (2002) (citing and describing six different scholarly lists of the incidents of property); Dagan, *supra* note 4, at 1532 (“There is [not] an a priori list of entitlements that the owner of a given resource inevitably enjoys . . .”). Compare JESSE DUKEMINER & JAMES E. KRIER, *PROPERTY* 86 (3d ed. 1993) (listing the rights to possess, use, exclude, and transfer), with Richard A. Epstein, *Property and Necessity*, 13 HARV. J.L. & PUB. POL’Y 2, 3 (1990) (listing the rights to possess, use, and dispose of), and Honoré, *supra* note 17, at 113–28 (listing the rights to possess, use, manage, receive income and capital, and maintain security and residuary character; the incidents of transmissibility and absence of term; the prohibition of harmful use; and the liability to execution). In fact, modern statutory and judicial conceptions of certain “property” classes explicitly limit the incidents granted to those classes. For example, although the right to use and enjoyment is typically regarded as a core incident of property, no such right exists in a patent grant. See, e.g., *Bloomer v. McQuewan*, 55 U.S. 539, 548 (1852) (“The franchise which the patent grants, consists altogether in the right to exclude every one from making, using, or vending the thing patented, without the permission of the patentee. This is all that he obtains by the patent.”); see also Jacqueline Lipton, *Information Property: Rights and Responsibilities*, 56 FLA. L. REV. 135, 171–73 (2004) (discussing the discrepancies between the traditional incidents of property and the incidents granted in intellectual property).

government regulation²⁸¹ before "property" is considered taken and compensation demanded by the Constitution.²⁸² Scholars have frequently noted, for instance, that policing the boundaries of regulatory takings is particularly difficult in the era of the "bundle of rights" property conception.²⁸³ This Section shows the importance of the value theory both in shaping the list of rights attending property ownership and in determining which of the rights are indispensable. Later, Part VI considers some of the implications of the value approach to such conundrums as the proper scope of regulatory takings.

²⁸¹ Compare, e.g., *Miller v. Schoene*, 276 U.S. 272, 277, 281 (1928) (finding no taking where a state regulation required owners to cut down red cedar trees infected with a virus that could kill apple trees), with *Dep't of Agric. & Consumer Servs. v. Mid-Fla. Growers, Inc.*, 521 So. 2d 101, 102 (Fla. 1998) (holding full and just compensation required when state, pursuant to its police power, destroyed healthy trees). Compare also *Pa. Coal Co. v. Mahon*, 260 U.S. 393, 414-15 (1922) (finding that the elimination of mining rights constitutes a taking), with *Keystone Bituminous Coal Ass'n v. DeBenedictis*, 480 U.S. 470, 506 (1987) (holding the elimination of mining rights is not a taking). See, e.g., ACKERMAN, *supra* note 7, at 3 (writing that takings jurisprudence is "set of confused judicial responses"); Raymond R. Coletta, *Reciprocity of Advantage and Regulatory Takings: Toward a New Theory of Takings Jurisprudence*, 40 AM. U. L. REV. 297, 299-300 (1990) (Takings jurisprudence is a "chameleon of ad hoc decisions that has bred considerable confusion . . ."); Andrea L. Peterson, *The Takings Clause: In Search of Underlying Principles Part I—A Critique of Current Takings Clause Doctrine*, 77 CAL. L. REV. 1301, 1304 (1989) ("[I]t is difficult to imagine a body of case law in greater doctrinal and conceptual disarray."); Carol M. Rose, *Mahon Reconstructed: Why the Takings Issue Is Still a Muddle*, 57 S. CAL. L. REV. 561, 562 (1984) (exploring "possible reasons for the elusiveness of the meaning of 'taking' in our law"). Indeed, there is a small cottage industry in stringing together quotes proclaiming the hopelessness of attempting to understand takings jurisprudence. See, e.g., Michael A. Culpepper, Comment, *The Strategic Alternative: How State Takings Statutes May Resolve the Unanswered Questions of Palazzolo*, 36 U. RICH. L. REV. 509, 509 (2002) ("[C]ritics describe the law of federal takings jurisprudence as 'an unworkable muddle,' as 'a jumble of confusing holdings,' and as a body of law existing in 'doctrinal and conceptual disarray.'" (citations omitted)); Zach Whitney, Comment, *Regulatory Takings: Distinguishing Between the Privilege of Use and Duty*, 86 MARQ. L. REV. 617, 618 (2002) ("Commentators have eloquently described the law of takings as 'engulfed in confusion,' 'suffer[ing] from its own inconsistency,' 'a problem of considerable difficulty,' and 'a secret code that only a momentary majority of the Court is able to understand.'" (citations omitted)); cf. Marc R. Poirier, *The Virtue of Vagueness in Takings Doctrine*, 24 CARDOZO L. REV. 93 (2002) (

Everyone has heard the grumbling about the vagueness or messiness of the doctrine of regulatory takings. In judicial opinion and academic assessment alike, it seems almost *de rigueur* to include at least one or two choice sentences of complaint, before going about whatever business the opinion or article seeks to accomplish.

).

²⁸² See U.S. CONST. amend. V ("[N]or shall private property be taken for public use, without just compensation."); see also William B. Stoebuck, *A General Theory of Eminent Domain*, 47 WASH. L. REV. 553, 555 (1972) (discussing state "just compensation" provisions).

²⁸³ See, e.g., Bruce A. Ackerman, *Four Questions for Legal Theory*, in PROPERTY: NOMOS XXII, *supra* note 5, at 351, 365 ("Without [the bundle-of-rights] theory, the Scientific Policymaker would have no choice but to interpret the Takings Clause as . . . protecting *all* uses once they have been legally authorized. But the [constitutional] text does not impose such an absurd command."); Michael A. Heller & James E. Krier, *Deterrence and Distribution in the Law of Takings*, 112 HARV. L. REV. 997, 1015 (1999) (discussing how "'private property' cannot meaningfully be defined absent context").

The bundle of rights conception has spawned various formulations of property incidents. The most minimal formulation, and possibly most widely accepted, enumerates the rights to use, exclude, and transfer as the constitutive elements of property.²⁸⁴ The most expansive one, compiled by Honoré,²⁸⁵ lists eleven incidents as the contents of property, yet omits the right to exclude, which is considered by many as "one of the most essential sticks in the bundle of rights that are commonly characterized as property"²⁸⁶ or even its "sine qua non."²⁸⁷ The view of property as a bundle of rights has wrought more perplexity than clarity, leading J.E. Penner to conclude that "[p]roperty is a bundle of rights' is little more than a slogan."²⁸⁸

The challenge facing a property theorist is to explain why any particular list is essential to property, and why it should be preferred over its competitors. The answer to this challenge lies in the common theme underlying the law of property—the protection of value. Begin with the right to exclude; exclusion is essential to property owners because it protects stable possession by repelling nonconsensual takers and users of the asset. Recalling the earlier discussion of the importance of in rem rights to property, intrinsic to the nature of property is that it must defend against takings that will substantially reduce or eliminate the value owners derive from the asset. From a systemic viewpoint, the right to exclude does exactly that through the wholesale engendering of the necessary element of stability of ownership.

An important aspect of the value enabled by the right to exclude is sentimental or other idiosyncratic value not reflected in the market price.²⁸⁹ Often, owners develop sentimental relationships with assets protected by property rights, such that their "reserve price" (the price at which they would be willing to sell the object) is substantially in excess of the market price.²⁹⁰ These gaps between reserve and market prices should be widely observed, and the value reflected by the higher reserve price can often be protected only by an in rem right that includes the right to exclude nonconsensual users.

This Article's value-based perspective provides an even more basic explanation of such property incidents as use and transfer. Use represents direct extraction of value for the owner, and transfer embodies the potential to extract value from the asset by conveying it to

284 See, e.g., DUKEMINIER & KRIER, *supra* note 280, at 86 (listing the incidents of property as the rights to possess, use, exclude, and transfer).

285 See Honoré, *supra* note 17, at 113.

286 Kaiser Aetna v. United States, 444 U.S. 164, 176 (1979).

287 Thomas W. Merrill, *Property and the Right to Exclude*, 77 NEB. L. REV. 730, 730 (1998).

288 See Penner, *supra* note 85, at 714.

289 See Radin, *supra* note 20, at 959–60.

290 See *supra* Part III.B.

others who might value it more highly, either for consideration or as a gift. Furthermore, owners may derive value from discretionary non-use of assets. For instance, Weepy Willa may keep in storage her grandmother's first grade book and derive sentimental value from mere possession of the object and knowledge that it continues to exist. Honoré's listed incidents of the right to property's income and capital²⁹¹ should be seen as corollaries of the right to use, as interpreted by the value theory.

At the end of the day, the value-based theory offers an auspicious opportunity for the law of property to regain its coherence by doing away with the enterprise of endlessly compiling competing lists of incidents, and adopting in their stead a single focus on value. Essentially, the value theory of property posits that all property incidents are mere manifestations of a central right to enjoy and protect value. This paradigm shift has a number of important implications for property law, which are discussed later in Part V.

D. What Enforcement

Enforcement issues were not part of the classic property discourse. As explained in Part VII, this oversight is unfortunate because enforcement issues are in large part responsible for the current disarray in property theory. Eventually, however, enforcement issues did find their way into the discussion thanks to Calabresi and Melamed's division of the legal protection of entitlements into property, liability, and inalienability rules.²⁹² Of particular importance was their choice of the term "property rule" to denote what is essentially injunctive relief.²⁹³ As Merrill and Smith noted, this use does not correspond to the general scholarly understanding of property.²⁹⁴ While on the surface, injunctive remedies might seem a natural expression of the right to exclude, the differences between the concepts are evident upon closer examination. The right to exclude refers to a right of property owners in the abstract; the "property rule" refers to the remedy that the courts will afford to the right claimant. Thus, for example, the fact that Xena owns a plot of land and possesses the right to exclude others is not dispositive of the question of how she may respond to the entry of Yvette. Generally, state laws will only allow Xena a limited right to forcibly eject Yvette; thereafter, Xena's right to exclude may be remedied only by turning to law enforcement authorities for relief. One might easily imagine the recognition of a right to exclude where its violation triggered a claim for monetary compensation (liability

²⁹¹ See *supra* text accompanying note 90.

²⁹² Calabresi & Melamed, *supra* note 111, at 1092.

²⁹³ *Id.*

²⁹⁴ Merrill & Smith, *What Happened to Property*, *supra* note 7.

rule protection, under Calabresi and Melamed's terminology)²⁹⁵ rather than injunctive relief.

Nevertheless, the value theory shows that the Calabresi-Melamedian decision to refer to injunctive relief as "property rule" protection captures a correct intuition. As law and economics scholars have noted, property rule protection enables the entitlement holder to set the price at which the item will be used or transferred.²⁹⁶ A fortiori, it also empowers the holder to refuse to deal altogether and keep the object. Property rule enforcement is therefore instrumental in the blocking of nonconsensual takings that may substantially deplete the value assets generate for their owners. Hence, the value theory shows that, *in general*, property rules are the proper enforcement mechanism for property rights.

It bears emphasis that despite the general affinity between property rights and injunctive relief, in some cases it would be justifiable to deviate from the norm and employ monetary damages, or "liability rules" in the Calabresi-Melamedian parlance.²⁹⁷ While injunctive remedies are necessary to protect the value derived by the owner from the assets, where the owner loses no value by having the asset taken and replaced by compensation, there is no longer any reason to demand injunctive relief. Consider, for example, Zelda's property interest in cash. If a twenty-dollar bill were taken from Zelda's purse, under most circumstances Zelda would lose no value if she were compensated with a different twenty dollar bill.

This example, however, also demonstrates the limitations of the principle. If the stolen twenty-dollar bill were the precise one received by Zelda for the sale of her first short story, she might have enjoyed sentimental value in ownership of the bill, such that a different twenty-dollar bill would no longer constitute adequate compensation. Even in cases in which the asset is devoid of sentimental value, there may be value in protecting the stability of ownership by means of injunctive relief. Obtaining compensatory relief and purchasing a replacement item are not costless actions, and judicially determined damages may often employ methods that undercompensate for property.²⁹⁸ If, for instance, Zelda needs cash, but she receives compensation in the form of a check, the cashing of which involves a fee or standing in line at a bank, then a twenty-dollar damage award will not be an adequate replacement for the twenty-dollar bill. Thus, when awarding compensatory damages for the loss of property, courts must

295 See *id.*

296 See *id.*

297 See *id.*

298 There may also be cases where the reserve price is *lower* than the market price, but transaction costs bar the consensual transfer of the property.

consider replacement costs and award aggrieved owners incidental and consequential damages.

The costs to ownership stability engendered by the refusal to extend injunctive relief do not constitute the only effect of liability rule (i.e., compensatory damage-based) protection. Liability rules may reduce transaction costs where private bargaining is expensive relative to litigation.²⁹⁹ Liability rules may also be helpful in overcoming strategic obstacles to successful negotiations.³⁰⁰ Thus, there may be cases where liability rule protection (or pliability rule, i.e., variable rule protection³⁰¹) may be the appropriate policy response to threats against property rights. In making the determination to turn away from injunctive relief (property rule protection), however, policymakers must take into account the likely disutility engendered by diminished ownership stability.

V

UNDERSTANDING PROPERTY WITH THE VALUE THEORY

This Part moves from the theoretical to the applied and demonstrates the explanatory power of the value theory in property law. The Part proceeds by showing the value theory's power to explain several broad themes and specific doctrines in the law of property.

²⁹⁹ See Calabresi & Melamed, *supra* note 111, at 1105–10; see also Louis Kaplow & Steven Shavell, *Property Rules Versus Liability Rules: An Economic Analysis*, 109 HARV. L. REV. 713, 719, 726–27 (1996) (arguing that liability rules should be favored over property rules when transaction costs are high because the former minimize information costs).

³⁰⁰ On strategic obstacles to successful bargaining, see Robert Cooter, *The Cost of Coase*, 11 J. LEGAL STUD. 1, 23 (1982) (showing that disagreement as to how to divide the contractual surplus is a strategic barrier to successful Coasean negotiation); see also John Kennan & Robert Wilson, *Bargaining with Private Information*, 31 J. ECON. LITERATURE 45, 46 (1993) (theorizing that differences in private information are a primary cause of delays in bargaining). On asymmetric information, strategic bargaining, and liability rules, see Louis Kaplow & Steven Shavell, Comment, *Do Liability Rules Facilitate Bargaining? A Reply to Ayres and Talley*, 105 YALE L.J. 221, 223–29 (1995) (

When each party's own valuation is not known by the other, each party will have incentives to misrepresent its valuation in bargaining, hoping to extract more of the bargaining surplus from the other party. Parties may therefore demand too much or offer too little, with the result that efficient bargains may not be reached. In this case, one cannot say unambiguously whether property rules or liability rules will be superior.

); Robert P. Merges, *Of Property Rules, Coase, and Intellectual Property*, 94 COLUM. L. REV. 2655, 2659 (1994) (observing that in the field of intellectual property the valuation problem heightens the possibility of strategic behavior); see also Karen Eggleston et al., *The Design and Interpretation of Contracts: Why Complexity Matters*, 95 NW. U. L. REV. 91, 109 (2000) (defining "asymmetric information" as a situation in which "[o]ne party to a contract . . . has more information about future states of the world than does the other party").

³⁰¹ See Abraham Bell & Gideon Parchomovsky, *Pliability Rules*, 101 MICH. L. REV. 1, 5 (2002) ("Pliability or pliable rules are contingent rules that provide an entitlement owner with property rule or liability rule protection as long as some specified condition obtains.").

A. Possession

The maxim "possession is nine-tenths of the law" is familiar to every first year law student.³⁰² Indeed, many property doctrines embody this principle by favoring the ownership claims of prior possessors. A classic example is the rule of capture established in *Pierson v. Post*.³⁰³ There, Post was chasing a fox on an uninhabited "waste land" aided by a pack of hounds.³⁰⁴ Pierson, "a saucy interloper,"³⁰⁵ espied the fatigued fox and swooped in to kill "the wild and noxious beast" and "bear away in triumph the object of pursuit."³⁰⁶ The court ruled that Pierson was the true owner because only he had "occup[ied]" the animal by taking physical possession.³⁰⁷ As for the original hunter, Post, the court said "mere pursuit" creates no property rights in wild animals.³⁰⁸

Another example of the primacy of prior possession is provided by the rule of find.³⁰⁹ The classic rule is that the finder of a lost chattel has a paramount right in the found object against every other person, except the true owner.³¹⁰ The finder, by having possession of the object, has legal recourse against other potential takers.³¹¹ Thus, for example, in *Armory v. Delamirie*,³¹² the court decreed a chimney sweep's claim to a found jewel was superior to that of the jeweler to whom the chimney sweep brought his find for appraisal.³¹³ While the court recognized that the chimney sweep was not the "true owner," it placed his rights as a prior possessor above those of others, including the jeweler who sought to seize the jewel for himself.³¹⁴

Carol Rose, and subsequently Henry Smith and Thomas Merrill, developed an information-based theory to explain the centrality of possession to property law. These scholars analyzed the communicative role of possession in conveying information to third parties. Rose,

³⁰² But see R. H. Helmholz, *Wrongful Possession of Chattels: Hornbook Law and Case Law*, 80 NW. U. L. REV. 1221, 1221-22 (1986) (acknowledging that "[i]t is hornbook law that possession of a chattel, even without claim of title, gives the possessor a superior right to the chattel against everyone but the true owner," and arguing that the hornbook law is not matched by case law).

³⁰³ 3 Cai. R. 175 (N.Y. Sup. Ct. 1805) (awarding property rights in a fox to the first possessor despite the practice that the pursuer should be entitled to catch the fox).

³⁰⁴ *Id.* at 175.

³⁰⁵ *Id.* at 180 (Livingston, J., dissenting).

³⁰⁶ *Id.*

³⁰⁷ *Id.* at 179.

³⁰⁸ *Id.* at 177.

³⁰⁹ DUKEMINIER & KRIER, *supra* note 280, at 103-21.

³¹⁰ *Id.* at 105.

³¹¹ See *id.* (noting that "the rule that a prior possessor prevails over a subsequent possessor applies in cases involving land as well as in cases involving personal property").

³¹² 93 Eng. Rep. 664 (K.B.) (1722).

³¹³ *Id.*

³¹⁴ *Id.*

for instance, explained that in order to function effectively, property doctrines must take account of the intended audience and the symbolic context.³¹⁵ Thus, in *Pierson v. Post*, the court had to choose between the rule of "hot pursuit" popular among hunters and the rule of capture that was more accessible to a broader audience, extending beyond the community of hunters.³¹⁶ This choice, according to Rose, determines which audiences win and which lose.³¹⁷ Possessory rules, in other words, are designed to convey context specific information about the rights and duties of competing claimants over assets.³¹⁸ Writing alone,³¹⁹ as well as with Merrill,³²⁰ Smith put a slightly different emphasis on the informational role of property. Smith and Merrill tackled the problem of how property could be efficiently protected and transferred in a world of uncertain ownership rights. To them, property doctrines, including the preference for possessors, are designed to convey information efficiently to third parties.³²¹ This is important not only in reducing the costs of discovering ownership prior to the transfer of personal property, but also in reducing evidentiary costs should disputes about ownership arise.³²²

Beyond the informational theorists, however, scholars have had great difficulty in explaining the primacy of possession. Richard Epstein, perhaps the foremost proponent of the rule of first possession, is surprisingly lukewarm in his normative support for the idea of possession in the abstract.³²³ To Epstein, the primary virtue of first possession as a rule of ordering property is the fact that it is already dominant and, therefore, lends stability to property rules.³²⁴ Epstein

³¹⁵ Carol M. Rose, *Possession as the Origin of Property*, 52 U. CHI. L. REV. 73, 85 (1985).

³¹⁶ *Pierson v. Post*, 3 Cal. R. 175, 181 (N.Y. Sup. Ct. 1805) (Livingston, J., dissenting).

³¹⁷ Rose, *supra* note 315, at 85 ("Audiences that do not understand or accept the symbols are out of luck.").

³¹⁸ See *id.* at 88.

³¹⁹ Smith, *supra* note 4, at 1108 (analyzing the communicative function of property law vis-a-vis "those under a duty to respect rights" and "those wishing to acquire rights").

³²⁰ Merrill & Smith, *Numerus Clausus*, *supra* note 4, at 8, 26 (justifying the *numerus clausus* principle based on the informational costs imposed by property rights on third parties).

³²¹ See *id.* at 26; Smith, *supra* note 4, at 1115–25 (discussing the communicative effects of possession).

³²² See Smith, *supra* note 4, at 1144–46.

³²³ See, e.g., Richard A. Epstein, *Intellectual Property: Old Boundaries and New Frontiers*, 76 IND. L.J. 803, 809 (2001) ("[A]n advantage to the first-possession rule that . . . offsets its evident disabilities . . . [is that it] gives property a single owner."); Richard A. Epstein, *Too Pragmatic by Half*, 109 YALE L.J. 1639, 1655 (2000) (book review) ("The first-possession rule has the virtue of assigning a single owner to a valuable asset . . . [b]ut as with all legal rules, its strengths should not blind us to its weaknesses.").

³²⁴ See, e.g., Richard A. Epstein, *Possession as the Root of Title*, 13 GA. L. REV. 1221, 1241 (1979) ("In essence the first possession rule has been the organizing principle of most social institutions.").

is less sure that possession would provide a good primary rule in property were it not already in use and popular.³²⁵

Even more troubling, informational theorists have not devoted much attention to two important caveats to the emphasis on possession. First, rules of possession are subsidiary, not primary. That is, rights of owners are preferred to those of possessors, and for possession to be important, ownership must be unclear or the owner must be unavailable to assert her rights.³²⁶ As such, while the finder has rights superior to those of subsequent takers, the true owner will still prevail over the finder.³²⁷ Second, the modern trend is to deemphasize the primacy of possessors' rights. Modern find statutes, for example, require finders to deposit found objects with the nearest police station, leaving the finder without any rights until the statutory period elapses.³²⁸ Both of these points demonstrate the limited range of possessory rules.

The value theory provides a better explanation of possessory rules, and especially of their limitations and the new trends limiting the importance of possession. The value theory explanation also stresses the importance of possessory rules in promoting stability, while contributing an explanation of why stability is best achieved through limited possessory rules. Moreover, it shows why, notwithstanding the informational aspects of possessory rules, an informational theory cannot provide a complete explanation for the possessory aspects of property law.

The value theory views possessory rules as oriented, like all property rules, toward the protection of the value that inheres in stable asset ownership. Possession affects value in two different ways. First, property protection is especially valuable for possessors because it reduces the cost of acquiring a replacement object; obviously, this

³²⁵ See Richard A. Epstein, *Class Actions: Aggregation, Amplification, and Distortion*, 2003 U. CHI. LEGAL F. 475, 483 (suggesting that early societies adopted the rule of first possession by default); Richard A. Epstein, *Property Rights Claims of Indigenous Populations: The View from the Common Law*, 31 U. TOR. L. REV. 1, 15 (1999) ("I . . . will happily defend [the first-possession rule] . . . [but] I give equal weight to the rule of prescription, the validity of treaties, and the principle of finality.").

³²⁶ See, e.g., *Sabariego v. Maverick*, 124 U.S. 261, 298–99 (1887) ([P]ossession is always presumption of right, and . . . stands good until other and stronger evidence destroys that presumption. . . . [Until a claim of title by possession has] matured . . . [it] may be removed from one side to the other, *toties quoties*, until one party or the other has shown a possession which cannot be overreached, or puts an end to the doctrine of presumptions founded on mere possession by showing a regular legal title or a right of possession. (emphasis added)). An important exception to this rule for some good faith purchasers for value is discussed in the next subsection. See *infra* Part V.B.

³²⁷ See *Sabariego*, 124 U.S. at 299 (noting that a showing of legal title will overcome mere possession).

³²⁸ E.g., N.Y. PERS. PROP. LAW § 252 (West 2003).

source of value applies only to possessors. A nonpossessor, by contrast, will have to incur transaction costs to obtain the primary object as well, making replacement a relatively less costly affair at the margin. Second, possession often enhances the subjective value that people attach to objects. As Justice Holmes famously argued in justifying the law of adverse possession, "[a] thing which you have enjoyed and used as your own for a long time, whether property or an opinion, takes root in your being and cannot be torn away without your resenting the act and trying to defend yourself."³²⁹ Whatever one may think of the strength of the claim regarding adverse possession, Holmes's logic certainly has resonance well beyond cases of adverse possession. The longer one is in possession of an object, the greater the potential for development of subjective value based on the wealth of the possessor's experiences.

The value theory also shows why possessory rules must be subsidiary to ownership rules. Since the value of stability in ownership would be seriously compromised by permitting current possessors to defeat the claims of owners, the law must properly assign a lower priority to possessors' claims. Moreover, where realistic steps can be taken to enhance the rights of the prior owner at the expense of the possessor's rights, such as by requiring the deposit of a find at a police station, the law of property should defend the stability of ownership rather than the current possession. However, where prior possessors compete with subsequent takers and the "true" owner is nowhere to be found, the law should favor prior possessors, thereby promoting and defending the value of stable ownership.

Consequently, the value theory provides an alternative explanation for many of the possession-related property doctrines discussed above. Consider first the rule of capture elucidated in *Pierson*. The value theory seeks to protect, first and foremost, the value that results from stable ownership. This value is fully developed only when an asset is appropriated and stably held. While the pursuit of such an object may give rise to a fraction of this value in the hands of the pursuer, the value, naturally, cannot yet be complete. For the pursuer, the marginal replacement cost remains relatively low because while obtaining replacements is costly, so is the successful completion of the pursuit. Thus, while hot pursuit as a rule of acquisition might easily serve the purposes of conveying information, it would not serve as well as a rule for maximizing the value that inheres in stable ownership.

Similarly, arguing for the importance of possession on the basis of the value theory, rather than on information or historical accident,

³²⁹ O. W. Holmes, *The Path of the Law*, 10 HARV. L. REV. 457, 477 (1897).

provides the key to understanding the law of find. The value theory posits that the value inherent in stable ownership should be protected by allowing the owner to prevail against all, and that the prior possessor should prevail against subsequent takers in order to protect the value of stable possession. The information theory, by contrast, has some trouble establishing why and when current possessors should lose to prior possessors. The importance of possession for information theorists depends on its ability to convey information,³³⁰ and in the absence of alternative information sources (such as registries), there would seem to be little reason not to give primacy to the current possessor. Thus, the information theory would seem equipped to explain why a first finder who loses the object should prevail against a subsequent finder.³³¹ Indeed, if possession rules are intended to convey to potential transferees that they may rely on the possessor's title without costly investigations, the better rule would be to favor the current, rather than the former, finder.

B. Chain of Title

A related property concept explained by the value theory of property is the notion of chain of title. Briefly stated, property views rights of ownership as being transferred from owner to owner in a chain. A transferee receives only such title as the transferor conveys, and, generally the transferee cannot receive title superior to that owned by the transferor. Thus, in order to determine to what extent any purported owner actually holds title over an asset, one must trace the provenance of the title to its "root," i.e., the original owner and grantor in the chain.³³²

The chain of title rule is instrumental in maintaining the value of stable ownership by ensuring that loss of possession—voluntary or involuntary—will not, of itself, endanger the ownership right. Consequently, the status and benefits of ownership may be enjoyed without excessive investment in the asset's protection.

The importance of chain of title is particularly noticeable with respect to marketplace transactions between non-owning possessors and good faith purchasers. In much of the world, a good faith pur-

³³⁰ See *supra* Part I.E.

³³¹ First finders do typically prevail. See *In re Seizure of \$82,000 More or Less*, 119 F. Supp. 2d 1013, 1019 (W.D. Mo. 2000) ("[T]he first finder who acquires dominion over [abandoned] property becomes its owner."); *Lawrence v. Buck*, 62 Me. 275, 275 (1874) ("[Lost] property belongs to the first finder as against all persons but the loser.").

³³² For practical purposes, the "root of title" in land transaction is generally traced back 60 years. See, e.g., N.J. STAT. ANN. § 2A:62-11 (West 2003) (permitting action to quiet title if "person in peaceable possession of lands . . . and claiming ownership thereof . . . is unable to ascertain the name or identity of [any rival claimant] from a search of the title of such lands, extending back 60 years from the time of the commencement of the suit").

chaser obtains good title to personal property bought in a market setting, regardless of whether the seller actually owned the object. Thus, for example, in many European countries, a good faith purchaser of a painting in an art gallery will obtain good title even though it may turn out that the gallery stole the painting from the artist.³³³ This is not the law in the United States. Here, the general rule of chain of title dictates that a purchaser may obtain no more rights than the seller has and wishes to convey.³³⁴ Only where a seller has "voidable" title—meaning that she obtained the object through fraud or mistake,³³⁵ or obtained possession through a person who has been "entrusted with the possession of the goods . . . by cosignors, creditors with unrecorded security interests, and certain other kinds of bailors"³³⁶—does the good faith purchaser for value obtain title good against everyone in the world, including the original owner.

For information theorists, these rules are somewhat puzzling. Merrill and Smith, for example, suggest that the good faith purchaser rules are designed to promote transferability by reducing the buyer's costs of obtaining information about the object's provenance.³³⁷ They, however, offer no explanation as to why this interest does not compel following the European rule of transferring ownership where the item is taken from the owner by theft rather than by fraud. Indeed, Merrill and Smith concede that, under their explanation, the good faith purchaser rules in the United States may not be ideal.³³⁸

In contrast, the value theory explains that the common law rules regarding "voidable" title protect the stability of ownership unless the owner herself manifests that she no longer demands ordinary protection of the value she enjoys in her ownership. For example, where an owner parts with her object in exchange for a bad check, she has voluntarily relinquished ownership, as far as she knows, for what is presumably an agreed-upon price. Thus, while the law must protect her

³³³ See, e.g., *Nat'l Employers' Mut. Gen. Ins. Ass'n Ltd. v. Jones*, 1 A.C. 24 (H.L. 1990) (appeal taken from Bridgend County Court) (dismissing appeal of decision favoring good faith purchaser of a stolen automobile); *Kuopila v. Finland*, 33 Eur. Ct. H.R. 25 (2001) (reporting that the Finnish court below, while convicting the art dealer of conversion, nonetheless ordered the painting returned to the good faith purchaser from whom it had been confiscated; n.b., the painting turned out to be a forgery).

³³⁴ See, e.g., *Schrier v. Home Indem. Co.*, 273 A.2d 248, 250-51 (D.C. App. 1971) ("[A] possessor of stolen goods, no matter how innocently acquired, can never convey good title . . . [because] a sale of such merchandise . . . does not divest the person from whom [the property was] stolen, of title." (citations omitted)).

³³⁵ See, e.g., *O'Keeffe v. Snyder*, 416 A.2d 862, 867 (N.J. 1980) ("[N.J.S.A. 12A:2-403(1)] . . . part of the Uniform Commercial Code . . . does not change the basic principle that a mere possessor cannot transfer good title . . . [but] permits a person with voidable title to transfer good title to a good faith purchaser for value in certain circumstances.").

³³⁶ See *Schrier*, 273 A.2d at 250.

³³⁷ Merrill & Smith, *Property/Contract Interface*, *supra* note 4, at 840.

³³⁸ *Id.*

interest in receiving full payment, there seems little reason to emphasize the value of a stable ownership relationship that has already been voluntarily sundered. Indeed, this legal strategy of compromising the property rights of the original owner, while leaving intact the right to recover in tort for fraud, underscores the importance of an analysis that focuses on the special value protected by property law, while leaving to other legal fields the task of utility-enhancing regarding other values.

As for transferring title of an "entrusted" object, the value theory concedes that the rule is based upon an assumption that the rule's cost to the value of stable ownership is less than the potential transaction costs that would be engendered by requiring verification of title. However, a full explanation of the entrusting rule requires an examination of property law's exclusion rules, which is discussed in the next Section.

C. Exclusion

The right to exclude others from using or entering into one's property is generally seen as one of the most important rights in property;³³⁹ Merrill³⁴⁰ and others³⁴¹ have gone further and argued that the right to exclude is the defining characteristic of property. The right to exclude spills over into many adjacent fields of law, including criminal and tort actions for trespass³⁴² and trespass to chattels,³⁴³ the constitutional right to have one's property be free of unwarranted entry and search,³⁴⁴ and procedural rights to injunctive relief in defense of

³³⁹ See, e.g., *Kaiser Aetna v. United States*, 444 U.S. 164, 179–80 (1979) ("In this case, we hold that the 'right to exclude,' so universally held to be a fundamental element of the property right, falls within this category of interests that the Government cannot take without compensation.").

³⁴⁰ Merrill, *supra* note 287, at 748 ("[T]he right to exclude seems always to accompany the right to property when and if the right becomes possessory.").

³⁴¹ See, e.g., Richard A. Epstein, *Takings, Exclusivity and Speech: The Legacy of PruneYard v. Robins*, 64 U. CHI. L. REV. 21, 22 (1997) ("[I]t is difficult to conceive of any property as private if the right to exclude is rejected."); Penner, *supra* note 85, at 742–43 (explaining that property involves more than a right to exclude). But cf. Cynthia L. Estlund, *Labor, Property, and Sovereignty After Lechmere*, 46 STAN. L. REV. 305, 345 (1994) ("[T]he right to exclude has traditionally been broader . . . than justified by the . . . benefits . . . [it] secures.").

³⁴² See, e.g., *eBay, Inc. v. Bidder's Edge, Inc.*, 100 F. Supp. 2d 1058, 1067, 1069 (N.D. Cal. 2000) (

If eBay were a brick and mortar auction house with limited seating capacity, . . . [it] would . . . be entitled to reserve those seats for potential bidders . . . and to seek . . . relief against non-customer trespassers [The evidence of] BE's ongoing violation of eBay's fundamental property right to exclude others from its computer system . . . support[s] a trespass cause of action].

(emphasis added) (citing *Thrifty-Tel, Inc. v. Bezenek*, 54 Cal. Rptr. 2d 468, 473 (1996))).

³⁴³ *Id.* at 1069.

³⁴⁴ U.S. CONST. amend. IV (

the right to exclude.³⁴⁵ Indeed, so powerful is the notion of the right to exclude in property conceptions, that Calabresi and Melamed have labeled the injunctive defense of entitlements as a property rule.³⁴⁶

The primary justification for the preeminence of the right to exclude is that it indirectly confers upon the property holder the right to determine the price for using the property³⁴⁷ and to "hold out" for greater compensation where others seek entry.³⁴⁸ Because compensation rules generally recognize only losses to property market value,³⁴⁹ the right to exclude protects the owner's ability to preserve idiosyncratic values, such as her subjective attachment to the property. In other words, the right to exclude defends the owner's ability to extract the full value of ownership right before departing with it.

The value theory of property thus explains cases like *Jacque v. Steenberg Homes, Inc.*, in which the court approved a jury award of \$100,000 in punitive damages for an intentional trespass on real property that caused no actual compensatory damages.³⁵⁰ In *Jacque*, the trespasser, Steenberg Homes, decided to deliver a mobile home to one of the Jacques' neighbors by plowing a path through the Jacques'

The right of the people to be secure in their persons, houses, papers, and effects, against unreasonable searches and seizures, shall not be violated, and no Warrants shall issue, but upon probable cause, supported by Oath or affirmation, and particularly describing the place to be searched, and the persons or things to be seized.

); see also *United States v. Karo*, 468 U.S. 705, 714-15 (1984) ("Searches and seizures inside a home without a warrant are presumptively unreasonable absent exigent circumstances."); *Mincey v. Arizona*, 437 U.S. 385, 393-94 (1978) ("[W]arrants are generally required to search a person's home or his person unless 'the exigencies of the situation' make the needs of law enforcement so compelling that the warrantless search is objectively reasonable under the Fourth Amendment.").

³⁴⁵ See *Weeks v. United States*, 232 U.S. 383 (1914) (establishing the "exclusionary rule," which maintains that evidence obtained through an illegal search is inadmissible in court).

³⁴⁶ Calabresi & Melamed, *supra* note 111, at 1105-06; see also Henry E. Smith, *Property and Property Rules*, 79 N.Y.U. L. REV. 1719 (2004) (arguing for tie between property rule protection and property rights on basis of information theory).

³⁴⁷ *Id.* at 1105.

³⁴⁸ *Id.* at 1106-07; Richard A. Epstein, *A Clear View of The Cathedral: The Dominance of Property Rules*, 106 YALE L.J. 2091, 2092-93 (1997); Merrill & Smith, *What Happened to Property*, *supra* note 7, at 382.

³⁴⁹ *United States v. Miller*, 317 U.S. 369, 373-74 (1943) (

In an effort . . . to find some practical standard, the courts early adopted, and have retained, the concept of market value. The owner has been said to be entitled to the 'value,' the 'market value,' and the 'fair market value' of what is taken. The term 'fair' hardly adds anything to the phrase 'market value,' which denotes what 'it fairly may be believed that a purchaser in fair market conditions would have given,' or, more concisely, 'market value fairly determined.'

(footnotes omitted)).

³⁵⁰ 563 N.W.2d 154, 166 (Wis. 1997). The jury also awarded \$1 in nominal damages. *Id.* at 156.

snowy field.³⁵¹ Though the Jacques refused permission, Steenberg Homes went ahead with the trespass, knowing that the regular road was covered by up to seven feet of snow and contained a tricky curve.³⁵² As Keith Hylton explained in defense of the punitive damage award, the substantial award was warranted by the "probable substantial secondary costs resulting from intentional invasions of property rights,"³⁵³ notwithstanding the absence of any direct damages of the kind normally compensated in such cases. In other words, the need to protect the value of stability in ownership warranted a large damage award notwithstanding the lack of any permanent physical damage to the field.

Conversely, the value theory of property explains why the right to exclude is less vigorously enforced against the "good faith improver."³⁵⁴ Here, the general rule created by "betterment statutes" is that where a trespasser improves another's property in good faith and under color of title or a mistaken belief of ownership, the encroaching improver may recover the value of the improvements from the true owner.³⁵⁵ Courts may also order special remedies such as permitting or requiring the true owner to sell the improved part of the property to the trespasser or even forcing a co-tenancy.

In permitting such remedies for the improver, betterment laws go against the general trend of enforcing the owner's right to exclude, even in the case of such apparently trivial trespasses as in *Jacque*. Yet, there are two important reasons why affording better treatment to the good faith improver does not seriously undermine the goals of property. First, because the betterment defense is predicated upon an "improvement" or "betterment" of the encroached-upon land, one can already be sure that at least the market value of the affected property will increase. While the encroachment may deleteriously affect the non-market value to the owner, including the stability of ownership, the increased market value ensures at least a partial offset. Second, the good faith requirement ensures that the negative effect on stability value will be minimized. Only rarely will a trespasser be able to demonstrate that her improvement was the result of a good faith mistake or good faith reliance on color of title. Consequently, the damage to stability value can be expected to be quite small.

³⁵¹ *Id.* at 156-57.

³⁵² *Id.* at 157.

³⁵³ See Keith N. Hylton, *Punitive Damages and the Economic Theory of Penalties*, 87 GEO. L.J. 421, 445 (1998).

³⁵⁴ For a comprehensive description of state rules regarding good faith improvers, see Kelvin H. Dickinson, *Mistaken Improvers of Real Estate*, 64 N.C. L. REV. 37, 42-49 (1985).

³⁵⁵ *Id.* at 42-43. Alternatively, courts may impose an equitable lien on the improved property to avoid liquidity problems for the true owner. See *id.* at 45-49.

In contrast, assessing harsh penalties for the trespass could result in substantial loss to the good faith improver. Given the likely minor loss of value to the property owner, the limited circumstances in which the trespass will be excused, and the likely great loss engendered by strict enforcement of the right to exclude, the value theory posits that injunctive relief—the standard remedy for violations of the right to exclude—may safely be withheld in such cases.

A similar phenomenon can be seen in the case of “entrusted” objects transferred to good faith purchasers. Favoring good faith purchasers over owners who entrusted their property to merchants dealing in goods of the same kind compromises to some extent the value inherent in stable ownership. The diminution in ownership value, however, is quite small and in most cases will be outweighed by the gain to the good faith purchaser. Here, the harm produced by strict enforcement of a chain of title approach includes a large increase in transaction costs, because all purchasers would have to invest heavily in examining the provenance of title. Conversely, the harm to stable ownership is reduced by the true owner’s voluntary relinquishment of possession by entrusting the object to another’s care and the limitation of the rule to good faith purchasers from a seller that ordinarily sells goods of the kind.³⁵⁶

D. Co-Tenancies

Because co-tenancies generally involve disputes among several owners, they require a slightly different application of the property analysis here.³⁵⁷ One of the rights generally enjoyed by co-owners is the right to partition, allowing the co-owners to end their co-tenancy and their property partnership.³⁵⁸ Co-tenancies may be partitioned in two ways: either by sale or in kind.³⁵⁹ In a partition by sale, the co-owned property is sold on the market, with the proceeds divided among co-owners in accordance with their relative shares.³⁶⁰ Partition in kind involves dividing the co-owned asset among the co-owners in accordance with relative shares.³⁶¹ Partition in kind often poses prac-

³⁵⁶ U.C.C. § 2-403 (2) (1988) (“Any entrusting of possession of goods to a merchant who deals in goods of that kind gives him power to transfer all rights of the entruster to a buyer in ordinary course of business.”).

³⁵⁷ The Article examines the issue of conflicts among property owners again in the context of leaseholds, *infra* Part VII.C.

³⁵⁸ See, e.g., *Delfino v. Vealencis*, 436 A.2d 27, 30 (Conn. 1980) (noting that courts of equitable jurisdiction allow “upon the complaint of any interested person, the physical partition of any real estate held by tenants in common”).

³⁵⁹ *Id.*

³⁶⁰ *DUKEMINIER & KRIER*, *supra* note 280, at 345–53.

³⁶¹ *Id.*

tical challenges, requiring careful examination of the value of the various components of the co-owned assets.³⁶²

Rhetorically, the courts have long exhibited a preference for partition in kind.³⁶³ This preference manifests itself in the rule that partition in kind will be imposed unless partition in kind is both impracticable and seriously prejudices co-tenants' interests.³⁶⁴ In practice, however, courts have often favored tilting the balance toward partition by sale.³⁶⁵ The courts have done so by collapsing the two-part test for partition in kind into a one-step inquiry into whether value would be lost by opting for partition in kind.³⁶⁶

In view of the value theory, the courts have reached precisely the right result. Questions of practicality in the ordinary test for partition in kind match the issue of ideal asset size noted above.³⁶⁷ As the value theory would suggest, the courts determine the question of asset size and forced sale by reference to value, rather than to property abstractions like Honoré's incidents. Moreover, even where partition by sale is favored, co-tenants may bid for the sold property; thus, partition by sale allows a co-tenant who has developed enough of a subjective attachment to have become the highest value user to take control of the property by submitting the appropriate bid. Partition in kind, on the other hand, may destroy value in all of those cases where preservation of value is incompatible with changes in the underlying property's physical nature or the property's division among many users.³⁶⁸

The analysis in this Article has even greater force when the asset requiring partition is a single movable object or indivisible real property. An heirloom dish, for example, will lose its value if it is shattered

³⁶² See Hanoch Dagan & Michael A. Heller, *The Liberal Commons*, 110 YALE L.J. 549, 616–17 (2001).

³⁶³ *Delfino*, 436 A.2d at 30 ("It has long been the policy of this court, as well as other courts, to favor a partition in kind over a partition by sale.").

³⁶⁴ *Delfino*, 436 A.2d at 30.

³⁶⁵ Dagan & Heller, *supra* note 362, at 607 ("Despite the heirs' request, and the law's nominal preference for partition in kind, courts usually order a partition sale because the number of heirs and limited size of the property make physical division impracticable."). But see Note, *Real Property*—Giulietti v. Giulietti—*Partition by Private Sale Absent Specific Statutory Authority*, 26 W. NEW ENG. L. REV. 125 (2004) (arguing that, under Connecticut law, partition in kind remains the preferred remedy).

³⁶⁶ See *Delfino*, 436 A.2d at 33.

³⁶⁷ *Id.* at 30–31 ("Under the [test for partition in kind], the court must first consider the practicability of 'physically partitioning the property in question.'").

³⁶⁸ For a more extensive analysis of the tradeoff involved in partition decisions, see Thomas J. Miceli & C.F. Sirmans, *Partition of Real Estate; Or, Breaking Up Is (Not) Hard to Do*, 29 J. LEG. STUD. 783 (2000) (developing a framework for choosing between partition in kind and partition by sale and noting that the choice entails a tradeoff between economies of scale and protection of subjective value).

in order to distribute the pieces among its co-owners.³⁶⁹ Similarly, when the co-owned asset is the family home, it cannot be partitioned in kind. Thus, the *de facto* practice is fully consistent with this Article's theory.

VI

REVISING PROPERTY LAW WITH THE VALUE THEORY

This Part discusses various areas of the law that should be revised in light of the value theory of property. As the reader should have discerned by now, this Article's analysis favors substance over form. Specifically, the Article seeks to do away with the "bundle of sticks" characterization and similar lists of property incidents, and, instead, focuses on the goal of maximizing the value inherent in stable ownership. To this end, this Part reviews several of the least coherent doctrines of property law—nuisance and takings—and shows how they may be rendered more coherent by analysis through the value prism.

A. Nuisance

Nuisance doctrine represents an important point of convergence between property and torts. A cause of action for private nuisance arises from "unreasonable interference with use and enjoyment of land."³⁷⁰ The first part of the definition draws heavily on the law of torts, while the latter relies on property law. Notwithstanding the relatively straightforward definition, nuisance doctrine ranks among the most confused areas of property law. As Dean Prosser famously stated, nuisance is "an impenetrable jungle" and a "legal garbage can."³⁷¹ The goal here is not to recount the various intricacies of nuisance doctrine, but rather to show how the doctrine's narrow focus on the incidents of use and enjoyment offers incomplete protection to property owners.

At first glance, it seems that nuisance law's protection of the owner's use and enjoyment right is fully consistent with the value theory of property. But, a closer examination reveals this is not the case. While use and enjoyment rights do enhance the value of assets for the owner, third parties can unreasonably lower the value of property without interfering with use or enjoyment. Consider, for example, the construction of a large industrial plant near a residential neighborhood. While proximity to the plant may unreasonably lower the value of all neighborhood property, it is possible that only a small portion of

³⁶⁹ See Lon L. Fuller, *The Forms and Limits of Adjudication*, 92 HARV. L. REV. 353, 394 (1978) (discussing a New York case in which a valuable collection of paintings was bequeathed to two museums "in equal shares").

³⁷⁰ DUKEMINIER & KRIER, *supra* note 280, at 956 (defining cause of action for nuisance).

³⁷¹ William L. Prosser, *Nuisance Without Fault*, 20 TEX. L. REV. 399, 410 (1942).

homes will be directly exposed to the smoke emitted from the plant stacks—presumably because the stacks are very tall.³⁷² Under these circumstances, no remote owner would be able to bring an action in nuisance against the plant even though the market value of her property has dropped considerably.³⁷³ Thus, under current nuisance law, the plant can effectively destroy the value of the remaining houses, because their owners have not suffered unreasonable interference with the “use and enjoyment” of their property.

In contrast, a value-oriented jurisprudence of nuisance law would recognize the rights of all homeowners in the value of their property. Rather than focus on the activity’s effect on use and enjoyment, the value theory would direct the court to examine the impact on value, which would necessarily be implicated. After all, most owners are concerned about the effect of various activities by third parties on the value of their property and not on specific incidents.

B. Takings

The power of the government to take property through eminent domain and the constitutional requirement that government pay whenever it abridges property rights in a manner labeled a “taking” are two of the most controversial and puzzling subjects in the law of property. They also apparently send contradictory signals about the importance of the value theory. On the one hand, the government’s eminent domain power seems to be completely at odds with the value theory of property. After all, the government’s ability to seize property directly undermines the stability of property rights. On the other hand, the limitation of the compensation requirement to “takings of property” seems directly to support this Article’s argument that the value of stability in ownership is a value which in itself warrants special protection. Here, the noteworthy fact is that government actions adversely affecting a person’s wealth are only compensable where they burden property,³⁷⁴ but not where they do so by nonproperty means.³⁷⁵ This Article shows that there is a place for both these aspects of takings law in the value theory. While we do not argue that current takings jurisprudence is consistent with this Article’s theory—

³⁷² Not all factory activity will necessarily constitute a nuisance; rather, unreasonableness is assumed for purposes of the example.

³⁷³ See generally Abraham Bell & Gideon Parchomovsky, Essay, *Takings Reassessed*, 87 VA. L. REV. 277 (2001) (exploring the effect of various land uses on the value of adjacent property).

³⁷⁴ As shall be discussed presently, the question of exactly what burdens on property are considered takings is one of the most unsolvable puzzles in the law. See *supra* note 281.

³⁷⁵ But see Richard A. Epstein, Foreword, *Unconstitutional Conditions, State Power, and the Limits of Consent*, 102 HARV. L. REV. 4, 60–64 (1988) (arguing that the compensation requirement of the Takings Clause should apply more broadly to wealth transfers).

indeed, as many scholars have noted, there is little consistency in takings law no matter how you look at it³⁷⁶—the takings power poses a much smaller challenge to this Article's theory than one might initially think.

Government actors will generally avail themselves of their eminent domain power when negotiations to purchase private property break down. In such cases, the government may take private property without the owner's consent provided that it does so for public use and in exchange for payment of just compensation.³⁷⁷ As a "privileged taker," the government with its eminent domain power can set aside many of the usual protections of private property and transfer ownership to itself.³⁷⁸ Scholars explain that this expansive power is necessary because the government often engages in large scale projects requiring coordinated development such as paving roads, building parks, and constructing infrastructure.³⁷⁹ In all of these instances, the government must deal with multiple property owners, each of whom has an effective veto power over the entire project.³⁸⁰ For this reason, negotiations between the government and property owners may often break down, as each individual owner seeks to secure rents above and beyond her reserve price.

In Calabresi-Melamedian terms, the eminent domain power enables the government to suspend the standard property rule protection that the owner enjoys and substitute it temporarily for liability rule protection.³⁸¹ With fewer tools to defend her property rights, the property owner enjoys less stability in her ownership, and presumably may extract less value. Importantly, under current takings law, just compensation for exercises of eminent domain consists of the market value.³⁸² Consequently, the net effect of government exercises of eminent domain deprives property owners of that portion of the value they have attached to their property that exceeds market price. This will include not only sentimental value, but also the value of stability that lies at the property system's heart.

Under the value theory, the power to seize property by eminent domain may be justified only if exercised in limited circumstances. Indeed, in practice, eminent domain is quite limited. The govern-

³⁷⁶ See *supra* note 281.

³⁷⁷ See U.S. CONST. amend. V ("[N]or shall private property be taken for public use, without just compensation.").

³⁷⁸ Cf. Abraham Bell, *Private Takings* (noting that many public takings are for private actors, and urging greater use of a private taking power) (on file with authors).

³⁷⁹ See SHAVELL, *supra* note 143.

³⁸⁰ *Id.*

³⁸¹ See Bell & Parchomovsky, *supra* note 301, at 59–60 ("By exercising its power of eminent domain, the government may transform the property rule protection into liability rule protection.").

³⁸² See *supra* note 349.

ment generally prefers to negotiate a consensual transfer with private property owners whose land may become subject to a taking.³⁸³ Given the high cost of eminent domain litigation for the government—both in monetary and political terms—the government will often choose to secure consensual agreement over going to court.³⁸⁴ Thus, the eminent domain power is likely to be invoked only where there is a large surplus to be obtained through public ownership of the property and where there are significant and costly barriers to successful negotiations.³⁸⁵ Yet, because compensation is restricted to market value, there is a significant risk that too much property will be taken from owners with rational high reserve prices.³⁸⁶

The value theory suggests that higher compensation should be awarded in place of the ordinary market value standard. In order to ensure that the damages paid resemble the actual value of which the owner is deprived,³⁸⁷ owners must be able to argue for exemplary

³⁸³ Merrill, *infra* note 384; see also Harry N. Scheiber, *The Jurisprudence—and Mythology—of Eminent Domain in American Legal History*, in *LIBERTY, PROPERTY AND GOVERNMENT: CONSTITUTIONAL INTERPRETATION BEFORE THE NEW DEAL* 217, 226–27 (Ellen Frankel Paul & Howard Dickman eds., 1989) (describing preference of nineteenth century railroads for negotiated land purchase rather than seizure by eminent domain).

³⁸⁴ See Thomas W. Merrill, *The Economics of Public Use*, 72 *CORNELL L. REV.* 61, 80 (1986).

³⁸⁵ *Id.* at 80–81.

³⁸⁶ This Article presumes, as does much of the literature on takings, that government actors contemplating takings are influenced by “fiscal illusion,” i.e., they discount costs imposed on the public that are not reflected in their own budgets. The aftermath of *Lucas v. South Carolina Coastal Council*, 505 U.S. 1003 (1992), provides a cogent example in support of this presumption. In 1988, South Carolina enacted the Beachfront Management Act, S.C. Code Ann. § 48-39-250–360 (Law. Co-op. 1990), prohibiting the development of certain coastal properties. *Lucas*, 505 U.S. at 1007. As a result, David Lucas was unable to develop two lots that he had purchased only two years earlier for \$487,500 each. *Id.* Following extended litigation, the Supreme Court upheld Lucas’s claim that the legislation worked a taking, and that he was therefore entitled to compensation. *Id.* at 2895–902. Faced with a court order to compensate Lucas for the taking, South Carolina settled the case by buying the lots from Lucas for \$425,000 each and paying his legal costs, which resulted in a total settlement of \$1.5 million. H. Jane Lehman, *Case Closed: Settlement Ends Property Rights Lawsuit*, CHI. TRIB., July 25, 1993, at C3. The state then repealed the preservation statute that had occasioned the lawsuit and put the two lots up for sale. WILLIAM A. FISCHER, *REGULATORY TAKINGS: LAW, ECONOMICS, AND POLITICS* 61 (1995). Astonishingly, South Carolina rejected an offer from Lucas’s former neighbors to purchase one of the lots for \$315,000 and preserve it undeveloped. *Id.* Instead, it sold the lots to a developer for \$392,500 each. *Id.* The numbers reveal that the South Carolina government was content to require beachfront preservation at a cost of \$487,500 per lot to Lucas, but not at a cost of \$77,500 per lot to itself. Less anecdotally, the empirical data can be said to support the presumption of “fiscal illusion.” *Id.* at 96–97; see also Abraham Bell & Gideon Parchomovsky, *Givings*, 111 *YALE L.J.* 547, 581 (2000); Louis Kaplow, *An Economic Analysis of Legal Transitions*, 99 *HARV. L. REV.* 509, 569 (1986). But cf. Barton H. Thompson, Jr., *Judicial Takings*, 76 *VA. L. REV.* 1449, 1490 n.164 (1990).

³⁸⁷ For a discussion of the importance of accurate damage payments in order to reduce fiscal illusion of governmental decisions to take property, see Laura H. Burney, *Just Compensation and the Condemnation of Future Interests: Empirical Evidence of the Failure of Fair Market Value*, 1989 *BYU. L. REV.* 799, 785–97; Kaplow, *supra* note 386, at 570; Michael H.

damages *a la* trespass³⁸⁸ in order to recover idiosyncratic value. Alternatively, damages should be raised to include a penalty reflecting the expected gap between the actual value enjoyed by the owner and the lower market value.³⁸⁹

Closely related to the question of the ideal quantum of compensation is the question of what government actions should constitute takings. While straightforward exercises of the eminent domain power are easily identified as takings, other categories of government action are less easily classified. The government may affect property through the exercise of many of its powers, giving rise to a category of "regulatory takings" which go "too far" in adversely impacting property rights while not formally exercising the eminent domain power.³⁹⁰ Additionally, the government may undertake other actions, such as improving schools or reducing police protection, that will impact positively or negatively upon an individual's welfare without directly affecting property or invoking the obligation to pay compensation for takings.

While the value theory cannot resolve all of the difficulties plaguing the perennially puzzling field of regulatory takings, it nevertheless provides several important insights. First, the value theory explains why there may be particular need to deter government actions that reduce wealth by adversely affecting property rights (as opposed to government actions that reduce wealth by means of other mechanisms). The Fifth Amendment protects property (and only property) against governmental takings.³⁹¹ As various scholars have noted, takings of property are only one of many ways in which the government can affect the wealth of its citizenry.³⁹² Various types of regulation

Schill, *Intergovernmental Takings and Just Compensation: A Question of Federalism*, 137 U. PA. L. REV. 829, 859-61 (1989).

³⁸⁸ See Part V.C.

³⁸⁹ Other scholars have suggested amplified damage payments as well. See Burney, *supra* note 387; Kaplow, *supra* note 386; and Schill, *supra* note 387.

³⁹⁰ The possibility that a regulation may work a taking was first recognized by the celebrated case of *Pennsylvania Coal v. Mahon*, 260 U.S. 393, 415 (1922). Writing for the majority, Justice Holmes famously stated that "while property may be regulated to a certain extent, if regulation goes too far it will be recognized as a taking." *Id.* at 415; see also DAVID A. DANA & THOMAS W. MERRILL, PROPERTY: TAKINGS 135 (2002) (noting that "short of 100 percent loss in value . . . the degree of diminution is just one factor to be considered [in deciding whether a taking has occurred]").

³⁹¹ U.S. CONST. amend. V.

³⁹² See, e.g., Marjorie E. Kornhauser, *The Rhetoric of the Anti-Progressive Income Tax Movement: A Typical Male Reaction*, 86 MICH. L. REV. 465, 502 n.121 (1987) ("Richard Epstein states that a progressive tax would be permissible if benefits from government increased faster than income." (citation omitted)); Jeremy Paul, *The Hidden Structure of Takings Law*, 64 S. CAL. L. REV. 1393, 1540 (1991) ("After arguing that government regulations that inflict loss should be viewed as presumptive rather than *per se* takings costonis suggests that courts should ask the crucial question: 'whether the government[']s . . . redistribution . . . is fair in principle.'").

and taxation impact unequally different parts of the population, and the Fifth Amendment poses no barrier to such actions.³⁹³ Yet, the value theory posits that government actions that diminish the value of stability in property ownership are different. This is because the government's power to take property not only threatens expropriation of an asset's market value; it also reduces the stability of all property and seizes the nonmarket subjective value that inheres in the asset. Consequently, there may be reason to push the government toward acquiring its revenue and assets by means that are likely to have this smaller welfare-reducing impact.

Second, the value theory suggests that of the many different rules that have been suggested and used throughout the years to identify regulatory takings, the one most suited to property protection may be the undue diminution of value standard first suggested by Justice Holmes in *Pennsylvania Coal v. Mahon*.³⁹⁴ Indeed, if property is to be seen as oriented toward defending value, there seems no better way to tell whether property has been unduly hurt by government action than to examine the effect on value.³⁹⁵ Other tests either fail to address the core concern of property law or address impacts on traditional "incidents" of property. Consider, for instance, the physical entry test, which views any physical entry on the owner's property as a compensable taking.³⁹⁶ While the entry certainly violates the right to exclude, the effect on value may be trivial, as in *Loretto v. Teleprompter Manhattan CATV Corp.*,³⁹⁷ where the court ruled that forced access to a cable box in an apartment building constituted a taking. This result seems a glorification of form over substance. A different objection may be leveled against the multifactored balancing test introduced in *Penn Central Transp. Co. v. New York City*.³⁹⁸ *Penn Central* creates an *ad hoc* inquiry that attempts to balance three factors in determining whether a regulatory taking has occurred: the owner's reasonable investment-backed expectations, the nature of the government action, and the degree of diminution in property value.³⁹⁹ While the focus on value is certainly laudable, neither the nature of the government action nor the investment-backed expectations of the owner have much to do with the core concern of property rights—the protection of value inherent in stable ownership. Thus, even if the *Penn Central*

³⁹³ Cf. Eduardo Penalver, *Regulatory Taxings*, 104 COLUM. L. REV. 2182 (2004).

³⁹⁴ 260 U.S. 393, 415 (1922).

³⁹⁵ *Mahon* left open the question of the baseline from which the diminution must be measured. *Id.* at 419. This Article also leaves that question for other analyses. See Bell & Parchomovsky, *supra* note 386, at 552.

³⁹⁶ *Id.* at 438.

³⁹⁷ 458 U.S. 419 (1982).

³⁹⁸ 438 U.S. 104 (1978).

³⁹⁹ *Id.* at 124.

test were workable, it would make a poor candidate for a universal test of regulatory takings according to the value theory. In establishing that a complete destruction of a property's value necessarily constitutes a regulatory taking, *Lucas v. South Carolina Coastal Council*⁴⁰⁰ certainly accords with the value theory. It is unclear, however, what *Lucas* adds to the undue diminution test.

VII

THE BOUNDARIES OF PROPERTY

The analysis, thus far, has laid out a theory of property and illuminated the contours of property law. In this Part, we look beyond property law to other legal fields and attempt to provide answers to two questions. First, when should property law bow to the needs of other legal fields dealing with assets? Second, how should property react when it comes into conflict with its own imperatives, such as when incompatible property rights clash with one another? Some of these questions have already been partially addressed by discussions of such topics as eminent domain.⁴⁰¹ This Part now explicitly addresses these questions by examining several specific examples that are typical of situations in which the two questions arise.

A preliminary historical note is in order here. As Kenneth J. Vandeveld has shown, the nineteenth century witnessed a vast expansion in the understanding of property, as courts incorporated such concepts as choses in action.⁴⁰² This was due not to a revolution in theory, but rather was due to consistent efforts by claimants to take advantage of the greater legal relief available to property claims. It is in this light that claims of property status of such items as debts, instruments, and choses in action must be evaluated.

A. Bankruptcy, Mortgages, and Sureties

Property is intimately tied up with the practice of granting sureties for indebtedness. Indeed, in primitive property systems that centered property rights on possession, many forms of property developed specifically to permit systems of pledges or the extraction of profit for the provision of credit.⁴⁰³ For example, some have argued that leaseholds developed in England in order to provide for the

⁴⁰⁰ 505 U.S. 1003 (1992).

⁴⁰¹ See *supra* Part VI.B.

⁴⁰² See Kenneth J. Vandeveld, *The New Property of the Nineteenth Century: The Development of the Modern Concept of Property*, 29 BUFF. L. REV. 325, 328-30 (1980).

⁴⁰³ See, e.g., Robert C. Ellickson & Charles Dia. Thorland, *Ancient Land Law: Mesopotamia, Egypt, Israel*, 71 CHI.-KENT L. REV. 321, 396-98 (1995) (explaining how pledges were used by earlier civilization).

taking of interest on loans secured by land.⁴⁰⁴ Although sureties law involves assets and may use some of the same forms familiar to property law, it is clear from the analysis in this Article that the underlying goals of sureties law differ from those of property.

Consider a loan of \$10,000 secured by a pledged automobile. The aim here is not to enhance value by creating a stable ownership relationship between the lender and the automobile. Rather, it is to ensure that the lender can extract the market value of the automobile in order to satisfy the loan. Clearly, loan transactions often sacrifice some of the value inherent in stable ownership to increase the likelihood of repayment. For the lender, maximizing the value to be derived from the asset is less important than ensuring that the existing asset value be used to secure the loan.

Concretely, the pledging of the automobile in the above example is likely to destroy value in several related ways. It weakens the owner's personal attachment to the vehicle; it transfers possession of the car to an arguably less efficient user; and it may even diminish what Dan-Cohen labeled ownership value⁴⁰⁵ by loosening the ownership bond. For the lender, however, all of the value lost is irrelevant, so long as the remaining value is sufficient to repay the debt. Indeed, since the lender is unlikely to want the pledged asset herself, her real interest will be in those asset values that can be realized in a market transaction.

To be sure, the lender will be interested in a stable relationship with the asset. Greater stability ensures greater likelihood of repayment. This stable relationship, however, is not one of ownership and does not entail the same value creation of ownership as defended by the law of property. There are instances where the law attempts both to ensure repayment and preserve the value of stable ownership. Such an attempt can be found in debtor-in-possession schemes in the law of bankruptcy, for example.⁴⁰⁶ These attempts, however, are the exception that prove the rule; the difficulty in reconciling the two goals of repayment and value through stable ownership can be seen in the extreme measures necessary to ensure that the debtor-in-possession does not act to the detriment of creditor interests.⁴⁰⁷

It is against this background that one can understand the controversies surrounding mortgages in property law. Formally, when a debtor executes a mortgage, the debtor conveys title to the underlying

⁴⁰⁴ See ROGER A. CUNNINGHAM ET AL., *THE LAW OF PROPERTY* 80 (2d ed. 1993) (stating that leaseholds "seem originally to have been designed to avoid the ecclesiastical prohibition against usury in connection with loans").

⁴⁰⁵ See Dan-Cohen, *supra* note 20.

⁴⁰⁶ See Thomas G. Kelch, *The Phantom Fiduciary: The Debtor in Possession in Chapter 11*, 38 WAYNE L. REV. 1323 (1992).

⁴⁰⁷ *Id.* at 1350-1351.

property asset to the creditor as security for the loan.⁴⁰⁸ In turn, the creditor agrees to reconvey the mortgage and title back to the debtor upon the loan's repayment.⁴⁰⁹ In substance, however, the parties intend only to grant the creditor a security interest in the property, rather than full title. As a result, most jurisdictions reject the "title theory" which interprets a mortgage transaction in accordance with its formal meaning.⁴¹⁰ Rather, most states now treat mortgages in accordance with the "lien theory," which views mortgages as merely conveying a security interest or lien on the property, while title remains in the debtor.⁴¹¹

How ought the law to deal with an interest denominated as property, but actually intended as a surety? The answer, unfortunately, depends on the context. Where repayment of the loan is likely, the law has a great interest in maintaining the stable ownership value resulting from the debtor's property interest. Once levying on the asset is more likely, however, this interest is greatly diminished. Indeed, it is highly likely that the ownership relationship will soon be terminated in order to allow repayment. This means that many of the values of stable ownership will be greatly diminished. Conversely, the value of stability in surety will correspondingly rise. Accordingly, as a debtor edges closer to filing for bankruptcy, the law should diminish its protection of the debtor's stable ownership and increase the protection of the creditor's ability to have the debt repaid.

Bankruptcy law, for example, empowers courts to set aside transfers of assets occurring within one year of the filing date in order to improve the creditors' likelihood of recovering the debt.⁴¹² Although generally the law seeks to promote transferability of assets, in the case of bankruptcy, there exists a countervailing interest in ensuring the surety's stability by restricting assets. In bankruptcy cases, there is a high probability that the asset owner, knowing full well that the termination of the ownership relationship is imminent, will attempt to transfer the assets not to a higher value user, but rather to a person who will "shelter" the asset from the creditor and return it to the debtor at a later date. Sanctioning such practices would make it more costly for all property owners (including those who do not default) to borrow money against their assets and, therefore, reduce the utility of property owners as a group.

⁴⁰⁸ See, e.g., *Trauner v. Lowrey*, 369 So. 2d 531, 534 (Ala. 1979) ("Execution of a mortgage passes legal title to the mortgagee. . . . The mortgagor is left with an equity of redemption, but upon payment of the debt, legal title reverts in the mortgagor.").

⁴⁰⁹ *Id.*

⁴¹⁰ *DUKEMINIER & KRIER, supra* note 280, at 670 n.17.

⁴¹¹ *Id.*

⁴¹² See discussion in Anthony T. Kronman, *The Treatment of Security Interests in After-Acquired Property Under the Proposed Bankruptcy Act*, 124 U. PA. L. REV. 110, 110-11 (1975).

Much of the ambiguity in secured transactions arises from the apparently common perception that the law guarantees stability in property law better than it guarantees stability of surety. As a result, creditors will often insist upon clothing a security guarantee with the form of a property transfer, in order to enjoy the benefits of property law. This occurs, for example, in "sale and leaseback" arrangements. A sale and leaseback involves conveyance by sale of property from the seller to the buyer, and then reconveyance by lease of the property back from the buyer to the seller. The result, at least formally, is that title passes from seller to buyer while the seller retains use and possession of the asset and pays a leasing fee to the buyer.⁴¹³ The Uniform Commercial Code (UCC), however, dictates that the substance, rather than the form of a transaction, governs whether it will be viewed as a security interest.⁴¹⁴ Thus, even where parties purport to sell and then lease back an asset, courts following the UCC may disregard the conveyance and view the arrangement as a loan accompanied by conveyance of a security interest in the asset while title stays in place.⁴¹⁵

The value theory of property fully endorses this focus on substance over form. Under the value theory, one does not examine a list of "incidents" to determine where a property right resides. Rather, one looks to the party designated to enjoy the value of the asset, in particular the value of stability in ownership. Where it is clear that the purported seller of the title is in fact the person who will enjoy all of the asset's value unless there is a default on the loan, the value theory dictates that the "seller" should continue to be viewed as the owner of the property. Of course, the continued attempts by creditors to place themselves under the canopy of property law may indicate that bankruptcy and surety laws systematically fail to provide sufficient protection for stable surety.

B. Marital Property

Like issues of security interests, marital property questions arise in endgame situations. Marital property, in this context, is a term used to refer to assets to be divided equitably (or equally) between divorcing spouses.⁴¹⁶ This Article's theory suggests that the term "marital property" is a misnomer. The issue facing the court in divorce cases is not property ownership; on the contrary, it is usually clear who owns the assets to be divided. For instance, while the state

⁴¹³ See Thomas C. Homburger & Gregory R. Andre, *Real Estate Sale and Leaseback Transactions and the Risk of Recharacterization in Bankruptcy Proceedings*, 24 REAL. PROP. PROB. & TR. J. 95, 95-96 (1989).

⁴¹⁴ See U.C.C. §§ 1-201 (35), 9-408 (West 2002).

⁴¹⁵ See *In re Triplex Marine Main., Inc.*, 258 B.R. 659, 668 (Bankr. E.D. Tex. 2000).

⁴¹⁶ See Carolyn J. Frantz & Hanoah Dagan, *Properties of Marriage*, 104 COLUM. L. REV. 75, 75 (2004).

laws of property may dictate that only one of the spouses is the sole owner of a certain asset—say, a book—the doctrine of equitable (or equal) division may still consider the book “marital property,” requiring that it be divided between the spouses.⁴¹⁷ Moreover, some potential assets subject to division under “marital property” rules are not really property at all. For example, some states consider professional degrees to be marital property subject to division, notwithstanding that they are not property under the ordinary property laws of the state.⁴¹⁸

The theory developed here shows not only how, but also why the definition of marital property should diverge from that of ordinary property. Property doctrines create and defend value in stable ownership. The doctrine of equitable (or equal) distribution, by contrast, aims to achieve a just distribution of existing value. Accordingly, the underlying goals of property law and marital property law are widely divergent. Moreover, these goals come into conflict in many cases where a court, to achieve just division, must decree that certain assets be sold at market value or allocated to a divorcing spouse who is a lower value user.

This insight leads to two important consequences. First, distribution laws should cover those assets necessary for achieving a just distribution of wealth, irrespective of the suitability of the assets to property law. For example, while a university degree is not suitable to be considered property under this theory,⁴¹⁹ it may very well represent a source of wealth that is appropriate for equitable or equal distribution. Thus, courts that have attempted to determine whether degrees are subject to distribution by examining whether they are “property” have approached the question from the wrong perspective.⁴²⁰ Second, distribution laws should be applied so as to separate, as much as possible, questions of distribution and ownership. In other words, a decision that a just distribution requires allocation of the value of a certain asset to one spouse should not automatically lead to the conclusion that that spouse should be awarded ownership of the asset. For instance, the fact that a divorcing husband is determined to be justly entitled to the value of a family business should not preclude a decision that ownership should be awarded to the divorcing wife.⁴²¹

⁴¹⁷ *Id.* at 115–18.

⁴¹⁸ *E.g.*, *O'Brien v. O'Brien*, 66 N.Y.2d 576, 581 (1985).

⁴¹⁹ Under the test developed in *supra* Part IV.B., the taking of the diploma in this case will not deprive the recipient of the value represented by it.

⁴²⁰ *E.g.*, *In re Marriage of Graham*, 574 P.2d 75 (Colo. 1978); *Mahoney v. Mahoney*, 91 N.J. 488 (1982); *O'Brien v. O'Brien*, 66 N.Y.2d 576 (1985).

⁴²¹ Of course, such decisions will rely upon having sufficient assets to “reimburse” the husband for the business.

C. Property vs. Property Conflicts: Leaseholds

Conflicts between properties or between owners of properties are endemic. For example, in the earlier examination of the tort of nuisance, the focus was on the narrow question of whether the tort should address loss of value, rather than interference with use and enjoyment.⁴²² More broadly, however, nuisance must be seen as raising the perennial question of how the law should treat conflicts between properties or their owners. Similarly, property vs. property conflicts may arise in cases of encroachment and co-tenancies, as previously discussed,⁴²³ as well as in landlord-tenant law, which is the subject of this section.

Ironically, in property vs. property conflicts, the question of protecting the value of stable ownership becomes less pressing, just as it does in cases at the boundary of property, such as marital property. This is due to the fact that property vs. property conflicts will almost certainly end with one owner's stable property interest sacrificed over that of another's. The questions are therefore similar to those raised in the context of marital property. On the one hand, the court has to determine ownership, respecting the need to enhance the value that inheres in stable ownership. On the other hand, the court must also achieve a property distribution of rights—this time on the basis of efficient allocation of rights rather than justice.

In landlord-tenant law, the boundary problem of property raised by interproperty disputes is particularly acute. Leaseholds are generally recognized as estates in property.⁴²⁴ Thus, when a landlord rents an apartment to a tenant, the landlord conveys a property interest to the tenant by means of a contract—the lease.⁴²⁵ The landlord, of course, retains an estate in the realty as well—the reversion.⁴²⁶ Thus, conflicts that arise between landlord and tenant may be viewed as conflicts between their respective property interests. In recent years, courts have often resolved landlord-tenant disputes by resorting to contract law rather than property law.⁴²⁷ This is the counterintuitive result of a dispute in which both sides have well-defined property rights, but diverging interests regarding the enhancement and defense of value. Both landlord and tenant know the duration and scope of the leasehold. However, the interest of the tenant, who is granted temporary possession of the asset, is to maximize the utility she may derive from the asset during the duration of the leasehold,

⁴²² See *supra* notes 370–73 and accompanying text.

⁴²³ See *supra* Part V.

⁴²⁴ See *infra* note 428.

⁴²⁵ *Id.*

⁴²⁶ *Id.*

⁴²⁷ *Id.*

even if doing so will diminish the value of the landlord's reversion. The landlord, conversely, wishes to preserve the maximum value of the reversion property together with revenues received from the rental of the premises during the period of the leasehold, even at the expense of the property's value during the leasing period.⁴²⁸

Unfortunately, no hard and fast rule may be established for the approach to the property vs. property dispute in the context of leaseholds. On the one hand, because disputes are between landlord and tenant, who constitute a closed set of potential contractual parties, there is good reason to resort to the classical economic understanding of property as simply the set of default rules for contract. In leaseholds, the parties bargain with one another and thus have an opportunity to stipulate the terms that will govern their interaction. Because the contractual aspects of the relationship dominate the property aspects, the application of contract remedies and rules of interpretation is more consistent with the parties' expectations. Thus, contract law would provide the best way to resolve leasehold disputes. On the other hand, it is clear that there is considerable value in stable ownership for both tenant and landlord, in particular, because tenants will often develop sentimental value for their leased premises, while landlords will frequently be better suited to extract value (due to specialized knowledge) from their premises than anyone else in the market. These factors mitigate toward the application of property law. Moreover, leasehold disputes often must consider efficient allocation of existing property rights alongside the protection of value stemming from stable ownership. The result is a situation in which neither contract nor property law should be seen as complete answers to landlord-tenant issues.

Yet, the value theory can help resolve some of the issues raised by leaseholds. Consider, for example, the case of a rental apartment abandoned by a tenant three months into a two-year rental. A contractual approach to the lease would see the abandonment as a breach of the rental contract and require the landlord to mitigate damages by attempting to rent the premises to another. A property approach, by contrast, would view the leasehold as having been conveyed and would disallow the landlord's attempt to retake possession without court order dissolving the leasehold property interest. Thus, the property approach would require no attempt to mitigate damages. Courts faced with this question have gone both ways, although the recent trend is to adopt the contractual approach and require mitigation of dam-

⁴²⁸ For an economic analysis of leaseholds that emphasizes the reduction of opportunism as the key to choosing between property and contract, see Thomas J. Miceli et al., *The Duty to Mitigate Damages in Leases: Out with the Old Rule and in with the New* (Oct. 2001), at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=304963.

ages.⁴²⁹ The value theory sides with this new trend. Where a tenant has abandoned possession of her leasehold, she has manifested just how little value she receives from her ownership of the leasehold. Thus, there seems little need to use the law of property to defend the stable ownership value in the leasehold. Certainly, there is reason to defend the stable ownership value of the landlord's reversion; however, this will not be jeopardized by a mitigation of damages rule. The landlord will know how much value he attaches to the reversion, and on that basis he will decide whether it is worth renting the premises to a new lessee. The law needs only to protect the landlord's interest in realizing the benefit of his bargain, which is achieved by applying contract law.

CONCLUSION

The project of this Article has been to demonstrate that property law is neither an unintelligible "bundle of rights" nor a mere "background condition" that facilitates exchange. Property, in this Article's analysis, is center stage; it is a distinct and vital legal institution of its own merits with rules specifically designed to serve its purposes. This Article has shown that property is best understood as a legal institution designed to create and protect the value inherent in stable ownership of assets. The framework developed in this Article should help restore coherence and consistency to property law and scholarship. Naturally, the breadth of the subject prevents a comprehensive survey addressing every property doctrine or rule. Yet, the analytical approach offered by this Article should assist policymakers and legal scholars to make progress on three central property questions: (a) which legal relationships come within the scope of property law; (b) what is the content of these rights; and (c) how should they be protected? Properly understood, property is a fairly coherent legal concept whose centrality in legal thought is completely justified.

The analysis here also has important normative implications. The value prism should prove useful for courts and legislatures in designing new property regimes and revising existing ones. Not only does it point to the core function of property law, but it also delineates the limits of the field. Moreover, by offering a full account of the costs and benefits generated by the institution of property, the Article illuminates the tradeoffs involved in the field of property law. Naturally, this analysis does not settle every theoretical or practical dispute that may arise with respect to property. Nevertheless, by providing a common basis for understanding and discussing property, the Article paves the way for novel and insightful scholarly contributions that will carry the study of property into the future.

⁴²⁹ See *id.*

